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HABITS THAT HANDICAP



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The Menace of Opium, Alcohol, and Tobacco, and the Remedy

CHARLES B. TOWNS



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PREFACE

It is interesting to note that a year or more ago a few deaths from bichlorid of mercury poisoning caused within a period of six months a general movement toward protective legislation. This movement was successful, and after the lapse of only a short time the public was thoroughly protected against this dangerous poison. It will be observed that the financial returns from the total sale of bichlorid of mercury tablets could be but small. Had the financial interests involved been of a magnitude comparable with those interested in the manufacture and promotion of habit-forming drugs, I have often wondered if the result would not have been less effective and as prompt. Bichlorid of mercury never threatened any large proportion of the public, and those falling victims to it merely die. Opium and its derivatives threaten the entire public, especially those who are sick and in pain, and with a fate far more terrible than death—a thraldom of misery, inefficiency, and disgrace.

Lest somewhere there be found within the pages of this book remarks that may lead the reader to suppose that I unduly criticize the doctor, and therefore that I am the doctor's enemy, I feel that it behooves me to add that in the whole community he has not one admirer more whole-souled.

PREFACE

Some years ago, Mr. Charles B. Towns came to me with a letter from Dr. Alexander Lambert and claimed that he had a way of stopping the morphia habit. The claim seemed to me an entirely impossible statement, and I told Mr. Towns so; but at Dr. Lambert's suggestion, I promised to look into the matter. Accordingly, I visited Mr. Towns's hospital, and watched the course of treatment there at different times in the day and night. I became convinced that the withdrawal of morphine was accomplished under this treatment with vastly less suffering than that entailed by any other treatment or method I had ever seen. Subsequently, I sent Mr. Towns several patients, who easily and quickly were rid of their morphia addiction, and have now remained well for a number of years.

At that time I had the impression that the treatment was largely due to the force of Mr. Towns's very vigorous and helpful personality, but when subsequently a similar institution was established near Boston, I became convinced by

observation of cases treated in that hospital that Mr. Towns's personality was not an essential element in that treatment. His skill, however, in the actual management of cases, from the medical point of view, was very hard to duplicate, and Mr. Towns generously came from New York, when called upon, and showed us what was wrong in the management of cases which were not doing well. I do not hesitate to say that he knows more about the alleviation and cure of drug addictions than any doctor that I have ever seen.

All the statements made in this book except those relating to tobacco I can verify from similar experiences of my own, since I have known and used Mr. Towns's method of treatment.

I do not pretend to say how his treatment accomplishes the results which I have seen it accomplish, but I have yet to learn of any one who has given it a thorough trial who has obtained results differing in any considerable way from those to which Mr. Towns refers.

The wider applications and generalizations of the book seem to me very instructive. The shortcomings of the medical profession, of the druggists, and those who have to do with the management of alcoholics in courts of law seem to me well substantiated by the facts. Mr. Towns's plans for legislative control of drug habits also seem to me wise and far-reaching. He is, I believe, one of the most public-spirited as well as one of the most honest and forceful men that I have ever known.

I am glad to have this opportunity of expressing my faith and confidence in him and my sense of the value of the book he has written.

RICHARD C. CABOT.



INTRODUCTION

There is only one way by means of which humanity can be relieved of the curse of drug using, and that is to adopt methods putting the entire responsibility upon the doctor. Until the present legislation was passed in New York State, no one had ever considered the doctor's responsibility; this most valuable medical asset and most terrible potential curse had been virtually without safeguard of any effective kind. Discussion of the drug problem in the press dealt wholly with those phases which make themselves manifest in the underworld or among the Chinese. I am reasonably certain that until very recently the world had heard nothing of the blameless men and women who had become drug-users as the result of illness. This seems strange, since there are in the United States more victims of the drug habit than there are of tuberculosis. It is estimated that fifteen per cent. of the practising physicians in the country are addicted to the habit, and although I think this is an exaggeration, it is nevertheless true that habit-forming drugs demand a heavy toll from the medical profession, wrecking able practitioners in health and reputation, and of course seriously endangering the public.

I have elsewhere explained the fact that the medical man himself is ignorant of the length to which he can safely go in the administration of drugs to his patients. If he is ignorant of what quantity and manner of dosage constitutes a peril for the patient, is it not reasonable to suppose that similar ignorance exists in his mind with regard to his own relations with the drug habit? As a matter of fact, I know this to be the case; many physicians have come to me for help, and ninety-nine per cent. of them explained to me that their use of drugs was the direct outgrowth of their ignorance. If the man who practises medicine is unaware of what will bring about the habit, what can be expected of the medically uneducated citizen who is threatened by those in whom he has most confidencehis doctors?

The wide extent of the drug habit in this country has not been apparent. The man suffering from a physical disease either shows it or makes it known; the man suffering from the drug habit presents unfamiliar and unidentified symptoms,

and far from being willing to make his affliction known, through shame he tries to conceal it at all hazards. Until legislation forced the victims of drug habits by hundreds into Bellevue Hospital in New York, this great institution rarely had one as a patient. The sufferer from tuberculosis would seek this hospital, feeling that there he might find measurable relief; the druguser shunned it, for he was doubtful of receiving aid, and above all things he dreaded deprivation without relief. No man or woman will go to any institution for relief from the drug habit where the only treatment offered is that of enforced deprivation, for he or she knows perfectly well that deprivation means death. human longing can compare in intensity with that of the drug-user for his drug. Unrelieved, he will let nothing stand between him and it; neither hunger, nakedness, starvation, arson, theft, nor murder will keep him from the substance that he craves. Clearly humanity must be protected against such an evil. And the physician must be saved from it, for saving him will fulfil in a large measure the demand for the protection of the public.

After the experience of the medical profession of New York State with the workings of the

Boylan Act, it is scarcely probable that strong opposition to similar legislation will be made in other States. Even if other States delay in the enactment of right legislation, the Boylan Act may be considered not only a protective measure for the profession and the people of New York State, but it may be safely accepted as an educational pronouncement for the benefit of the medical profession everywhere. It establishes for the first time the danger-line.

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HABITS THAT HANDICAP



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CHAPTER I

THE PERIL OF THE DRUG HABIT

T is human nature to wish to ease pain and to stimulate ebbing vitality. There is no normal adult who, experiencing severe pain or sorrow or fatigue, and thoroughly appreciating the immediate action of an easily accessible opiate, is not likely in a moment of least resistance to take it. Every one who has become addicted to a drug has started out with small occasional doses, and no one has expected to fall a victim to the habit; indeed, many have been totally unaware that the medicine they were taking contained any drug whatever. Thus, the danger being one that threatens us all, it is every man's business to insist that the entire handling and sale of the drug be under as careful supervision as possible. It is not going too far to say that up to the present time most drugtakers have been unfairly treated by society.

They have not been properly safeguarded from forming the habit or properly helped to overcome it.

It has been criminally easy for any one to acquire the drug habit. Few physicians have recognized that it is not safe for most persons to know what will ease pain. When an opiate is necessary, it should be given only on prescription, and its presence should then be thoroughly disguised. A patient goes to a physician to be cured; consequently, when his pain disappears, he naturally believes that this is due to the treatment he has received. If the physician has used morphine in a disguised form, the patient naturally believes that the cure was effected by some unknown medicine; but if, on the other hand, he has received morphine knowingly, he realizes at once that it is this drug which is responsible for easing his pain. If he has received it hypodermically, the idea is created in his mind that a hypodermic is a necessary part of the treatment. Thus it is clear that the physician who uses his syringe without extreme urgency is greatly to be censured, for the patient who has once seen his pain blunted by the use of a hypodermic eagerly resorts to this means when the pain returns. Conservative practitioners are keenly

aware of this responsibility, and some go so far as never to carry a hypodermic on their visits, though daily observation shows that the average doctor regards it as indispensable. The conservative physician employs only a very small quantity of morphine in any form. One of the busiest and most successful doctors of my acquaintance has used as little as half a grain a year, and another told me he had never gone beyond two grains.

Both of these men know very well that only a small percentage of drug-takers have begun the practice in consequence of a serious ailment, and that even this small percentage might have been decreased by proper medical treatment directed at the cause rather than at its symptom, pain. An opiate, of course, never removes the cause of any physical trouble, but merely blunts the pain due to it; and it does this by tying up the functions of the body. It is perhaps a conservative estimate that only ten per cent. of the entire drug consumption in this country is applied to the purpose of blunting incurable pain. Thus ninety per cent. of the opiates used are, strictly speaking, unnecessary. In the innumerable cases that have come under my observation, seventy-five per cent. of the habitual users became such without reasonable excuse. Beginning with small occasional doses, they realized within a few weeks that they had lost self-control and could not discontinue the use of the drug.

FORMING THE HABIT

A very common source of this habit lies in the continued administration of an opiate in regular medical treatment without the patient's knowledge or consent, or in the persistent use of a patent medicine, or of a headache or catarrh powder that contains such a drug.

The man who takes an opiate consciously or unconsciously, and receives from it a soothing or stimulating or pleasant effect, naturally turns to it again in case of the same need. The time soon arrives when the pleasurable part of the effect—if it was ever present—ceases to be obtained; and in order to get the soothing or stimulating effect, the dose must be constantly increased as tolerance increases. With those who take a drug to blunt a pain which can be removed in no other way, it is fulfilling its legitimate and supreme mission and admits of no substitute. Where it was ever physically necessary, and that necessity still continues, an

opiate would seem inevitable. But the percentage of such sufferers, as I have said, is small. The rest are impelled simply by craving—that intolerable craving which arises from depriva-

tion of the drug.

But whether a man has acquired the habit knowingly or unknowingly, its action is always the same. No matter how conscientiously he wishes to discharge his affairs, the drug at once begins to loosen his sense of moral obligation, until in the end it brings about absolute irresponsibility. Avoidance and neglect of customary duties, evasion of new ones, extraordinary resourcefulness in the discovery of the line of least resistance, and finally amazing cunning and treachery—this is the inevitable history.

The drug habit is no respecter of persons. I have had under my care exemplary mothers and wives who became indifferent to their families; clergymen of known sincerity and fervor who became shoplifters and forgers; shrewd, successful business men who became paupers, because the habit left them at the mercy of sharpers after mental deterioration had set in. But the immediate action of morphine by no means paralyzes the mental faculties. Though when once a man becomes addicted to the drug he is

incapacitated to deal with himself, yet while he is under its brief influence his mind is sharpened and alert. Under the sway of opium a man does venturesome or immoderate things that he would never think of doing otherwise, simply because he has lost the sense of responsibility. I have had patients who took as much as sixty grains of morphine in a single dose, an overdose for about one hundred and fifty people, and about fifty grains more than the takers could possibly assimilate or needed to produce the required result—an excellent illustration of how the habit destroys all judgment and all sense of proportion.

Against this appalling habit, which can be acquired easily and naturally and the result of which is always complete demoralization, there is at present no effective safeguard except that provided by nature itself, and this is effective only in certain cases. It happens that in many people opium produces nausea, and this one thing alone has saved some from the habit; for this type of user never experiences any of the temporarily soothing sensations commonly attributed to the drug. Yet this pitiful natural safeguard, while rarely operative, is more efficacious than any other that up to the present

has been provided by man in his heedlessness, indifference, and greed.

DANGERS OF THE HYPODERMIC SYRINGE

I have seen over six thousand cases of drug habit in various countries of the world. Ninetyfive per cent. of the patients who have come to me taking morphine or other alkaloids of opium have taken the drug hypodermically. With few exceptions, I have found that the first knowledge of it came through the administration of a hypodermic by a physician. It is the instrument used that has shown the sufferer what was easing his pain. I consider that among those who have acquired the habit through sickness or injury this has been the chief creator of the drug habit. This statement does not apply to those who have acquired the habit through the taking of drugs otherwise. My work has been carried out almost entirely in cooperation with the physician, and I have not come in contact with the under-world drug-takers. I consider that the syringe has been the chief creator of the drug habit in this country. In 1911 I made this statement before the Ways and Means Committee of the United States Congress, then occupied with the matter of regulating the sale of

habit-forming drugs, and I personally secured the act which was passed by the New York legislature in February, 1911, to restrict the sale of this instrument to buyers on a physician's prescription. Before that time all drug stores and most department stores sold hypodermic instruments to any one who had the money. A boy of fifteen could buy a syringe as easily as he could buy a jack-knife. If a physician refused to give an injection, the patient could get an instrument anywhere and use it on himself. This bill has passed only a single legislature, but I am arranging to introduce a similar bill before all the others, and hope to have the State action confirmed by a Federal bill. At present in Jersey City, or anywhere out of New York, any one may still buy the instrument. It is inconceivable that the syringe should have gone so long without being considered the chief factor in the promotion of a habit which now alarms the world, and that as yet only one state legislature should have seen fit to regulate its sale. Restricting the sale of the syringe to physicians, or to buyers on a physician's prescription, is the first step toward placing the grave responsibility for the drug habit on the shoulders of those to whom it belongs.

HABIT-FORMING DRUGS IN PATENT MEDICINES

The second step to be taken is to prevent by law the use of habit-forming drugs in patent and proprietary medicines which can be bought without a physician's prescription. Prior to the Pure Food and Drugs Act, created and promoted by Dr. H. W. Wiley, druggists and patent-medicine venders were able, without announcing the fact, to sell vast quantities of habitforming drugs in compounds prepared for physical ailments. When that act came into effect, these men were obliged to specify on the label the quantities of such drugs used in these compounds, and thus the purchaser was at least enabled to know that he was handling a dangerous tool. Except in a few States, however, the sale of these compounds was in no way restricted, and hence the act cannot be said to have done much toward checking the formation of the drug habit. Indeed, it has probably worked the other way, for there is perhaps not an adult living who does not know that certain drugs will alleviate pain, and people who have pains and aches are likely to resort to an accessible and generally accredited means of alleviation. Yet the difficulties in the way of passing the Pure Food and Drugs Act are a matter of scandalous history. What, then, would be the difficulties in passing a Federal bill to restrict the sale of patent medicines containing habit-forming drugs? It is of course to the interest of every druggist to create a lasting demand for his article. There is obviously not so much profit in a medicine that cures as in one that becomes indispensable. Hence arises the great inducement, from the druggist's point of view, in soothing-syrups and the like. In this country all druggists, wholesale and retail, are organized, and the moment a bill is brought up anywhere to correct the evil in question, there is enormous pressure of business interests to secure its dismissal or satisfactory amendment.

To show the essential selfishness of their position, it is only necessary to quote a few of the arguments used against me before the Congressional Ways and Means Committee when I was making a plea for the regulation of the traffic in habit-forming drugs. They claimed that registration of the quantities of opiates in proprietary medicines would entail great bother and added expense, that these drugs are usually combined with others in such a way as to result in altering their effect on the user, and that, any-

way, so small an amount of these drugs is used that it cannot create a habit. Now, as a matter of fact, the combination of medicines in these remedies makes not the slightest difference in the physiological action of the drug; further, it is found that, just as with the drug itself, the dose of these compounds must be constantly increased in order to confer the same apparent benefit as in the beginning; and finally, it is well known that what creates the craving is not the quantity of the drug, but the regularity with which it is taken. A taker of one eighth of a grain of morphine three times a day would acquire the habit just as surely as a man who took three grains three times a day, provided the latter could tolerate that quantity.

The average opium-smoker consuming twentyfive pills a day gets only the equivalent of about a quarter grain of morphine taken hypodermically or of a half grain taken by the mouth. A beginner could not smoke a quarter of that quantity, but still he acquires the habit. Any amount of the drug which is sufficient to alleviate pain or make the taker feel easier is sufficient to create a habit. A habit-forming drug having no curative properties whatever is put into a medicine merely for the purpose of making the taker feel easier. One wholesale house alone prepares and sells six hundred remedies containing some form of opiate. Most of the cases of the cocaine habit have been admittedly created by so-called catarrh cures, and these contain only from two to four per cent. of cocaine. In the end, the snuffer of catarrh powders comes to demand undiluted cocaine; the taker of morphine in patent medicines, once the habit is formed, must inevitably demand undiluted morphine.

This easy accessibility of drugs in medicinal form is more dangerous than moralists care to admit. The reason why opiumsmoking has been, up to the present, less prevalent in the United States than in China and some other countries is probably that the preparation of it and the machinery for taking it are not convenient. If opium-smoking had been generally countenanced in America, if the sale of the pure drug had been for generations permitted here, as it has been in China, if houses for its sale and preparation had been found everywhere, if its social aspects had been considered agreeable, if society had put the stamp of approval upon it, opium-smoking would be as prevalent here as it has been in China. Our human nature is essentially little different from that of the Chinese, but lack of opportunity is everywhere recognized as a great preservative of virtue. Due allowance being made for the difference of moral concepts, our standards of morality and honesty and virtue are certainly no higher than those of the Chinese. Thus, were the conditions the same in both cases, there is no reason to suppose that opium would not be smoked here as much as there; but fortunately it has not yet become thus easy, convenient, and agreeable, and consequently that particular phase of the evil has not yet reached overwhelming proportions. On the other hand, the alkaloids of opium administered hypodermically or as ingredients in many patent medicines are thus convenient, and as a result this phase of the evil has reached overwhelming proportions. Nor have we any cause for congratulation upon our particular form of the vice, for opium-smoking is vastly less vicious than morphine-taking.

THE TRAFFIC IN OPIUM

Something more is needed, however, than mere restriction of the sale of hypodermic syringes and patent medicines by any one legis-

lature or country. All persons who handle habit-forming drugs should be made to give a strict accounting for them, otherwise the traffic can never be properly regulated. Four years ago, by special act of Congress, all importation of prepared opium and of crude opium designed for smoking purposes was prohibited. In the ample interval between the passage of the bill and its going into effect the importation of opium was simply phenomenal. By the time it went into effect the American dealers had learned the secret process of preparing opium for smoking, which had hitherto been known only in the Orient. Thereafter it was found that since responsible importing houses were still at liberty to import crude opium in any quantity for general medicinal use, the retailers could buy and were buying from importers all the crude opium they wished and preparing it themselves without having in any way to account for the use they meant to make of it, although that use had now become illegal. The result was that the smoker could get opium more easily than before, since the secret process of preparing it had become known; and having no longer to pay the enormous tax on prepared opium, he got it much cheaper. In short, the only difference was that

the Government lost about one million five hundred thousand dollars a year in revenue, while the vice was greatly increased. Thus the act had worked in precisely the opposite way from the intention of the framers, and all because men are permitted to handle opium without accounting for it. Until there is such an accounting, there can be no real regulation of the opium trade.

Congress has just passed a bill aiming to regulate the traffic in habit-forming drugs. I wish to go on record here as saying that this bill will not accomplish its purpose, and should be further amended to prove effective. But it will be only a matter of time when there will be amendments proposed, which, if adopted, will create legislation on this subject worth while.

The history of the Opium Commission appointed by Mr. Taft is sufficient to show how any less comprehensive regulation would act. When Mr. Taft was Governor-General of the Philippines, he found that an enormous quantity of opium was being smoked by the natives and the large Chinese settlement, of whom it was estimated that fifty-five thousand were smokers. He appointed a commission headed by Bishop Brent, now stationed at Manila, who has since

headed two international opium conferences, at Shanghai in 1909 and at The Hague in 1911. Mr. Taft sent the commission into the most important opium-producing countries to find out how they were dealing with the problem and what progress was being made toward decreasing the use of the drug. The nearest approach they found to a reform was the method of the Japanese in their newly acquired island of Formosa. Japan, with the most stringent regulation of the sale of opium in the world, had made it a government monopoly in Formosa, had compelled the registration of all smokers, and was gradually lessening the amount which each smoker could buy. After the exhaustive report of the commission, our Government adopted the same tactics in the Philippines. To the surprise of the officials, they found that out of the fiftyfive thousand opium-smokers they could obtain a registration of only from ten to twelve thousand, which meant that the great majority were getting smuggled opium. By special act of Congress the authorities at Manila were allowed to stop the importation of opium entirely. But this, while it meant a great loss of revenue to the local government, apparently did not lessen the amount smoked. After the sale was stopped, there were virtually no voluntary applications for opium treatment, as there must have been if anybody's supply had been cut off, which conclusively showed that nobody had discontinued the habit merely because importation had been discontinued. Stopping importation, then, is a farce, unless at the same time there is rigid governmental control in those countries that produce or import the drug. And, therefore, unless there should be a coöperation of all governments, it is futile to try to regulate the traffic. As long as people can get opium, they will smuggle it.

It has been demonstrated to be quite practicable for all the opium-producing countries to make the drug a government monopoly; it would be equally practicable for them to sell directly to those governments that use it for governmental distribution. The only obstacle to an international understanding is that the producing countries know very well that government regulation would materially lessen the sale of the drug. Within the borders of our own country such a system would simplify rather than complicate present conditions. We have to-day along our frontier and in our ports inspectors trying to stop the illicit traffic in opium, and the

money thus spent by our Government would be more than sufficient to handle and distribute all of the drug that is needed for legitimate purposes. Any druggist could of course continue to buy all that he wished, but he would have to account for what he bought. The drug would serve only its legitimate purpose, because the druggist could sell it only on prescription. This would at once eliminate the gravest feature of the case, the indiscriminate sale of proprietary and patent medicines containing small quantities of opium. The physician would thus have to shoulder the entire responsibility for the use of any habit-forming drug. With the Government as the first distributor and the physician as the last, the whole condition of affairs would assume a brighter aspect, for it would be a simple matter to get from the physician a proper accounting for what he had dispensed. Thus the new crop of users would be small, and less than ten per cent. of the opium at present brought into this country would be sufficient to meet every legitimate need.

THE HABIT-FORMING DRUGS

The important habit-forming drugs are opium, cocaine, and the small, but dangerous,

group of hypnotics. These last—trional, veronal, sulphonal, medinal, etc.—are chiefly coaltar products, and are not always classified as habit-forming drugs, but they are such, and there are many reasons why the sale of them should be scrupulously regulated. The opium derivatives go under the general head of narcotics. Morphine is the chief active principle, and codeine and heroin are the chief derivatives of morphine. Codeine is one eighth the strength of morphine; heroin is three times as strong as morphine.

Though the general impression is otherwise, the users of heroin acquire the habit as quickly and as easily as if they took morphine. Many cough and asthma preparations contain heroin, simply for temporary alleviation, since, like opium, it has no curative power whatever. From time to time I have had to treat cases of heroin-taking in which the victims had thought to satisfy their need for an opiate without forming a habit. In the cases where it was given by prescription, it was so given by the physician in the sincere belief that it would not create a habit. All this despite the fact that heroin is three times stronger than morphine, and despite the fact that physicians know that anything which will do the work of an opiate is an opiate. Codeine, notwithstanding the fact that it is weaker than morphine, is likewise habit-forming; yet doctors prescribe it on account of its relative mildness, even though they know that it is the cumulative effect of continued doses, and not the quantity of morphine in the dose, which results in habit. As with morphine, to use either of these drugs effectively means in the long run the necessary increase of the dose up to the limit of physical tolerance.

The most harmful of all habit-forming drugs is cocaine. Nothing so quickly undermines its victim or provides so short a cut to the insane asylum. It differs from opium in two important ways. A man does not acquire a habit from cocaine in the sense that it is virtually impossible for him to leave it off without medical treatment. He can do so, although he rarely does. On withdrawal, he experiences only an intense and horrible depression, together with a physical languor which results in a sleepiness that cannot be shaken off. Opium withdrawal, on the other hand, results in sleeplessness and extreme nervous and physical disorder. In action, too, cocaine is exactly the opposite of opium, for cocaine is an extreme stimulant.

Its stimulus wears off quickly and leaves a corresponding depression, but it confers half an hour of capability of intense effort. That is why bicycle-riders, prize-fighters, and racehorses are often doctored, or "doped," with cocaine. When cocaine gives out, its victim invariably resorts to alcohol for stimulus; alcoholics, however, when deprived of alcohol, generally drift into the use of morphine.

The widespread use of cocaine in the comparatively short period of time since its discovery has been brought about among laymen entirely by patent-medicine preparations containing small quantities of it. These have been chiefly the so-called catarrh cures, which of course cure nothing. With only a two or four per cent. solution, they have created a craving, and in the end those who could do so have procured either stronger solutions or the plain crystal. As with the other drugs, in order to maintain the desired result the dose must be increased in proportion as tolerance increases. Wherever the sale of patent medicines has been restricted to those presenting a physician's prescription, the consumption of cocaine has at once been lessened. A man cannot afford to get a physician's prescription for a patent medicine;

and even if he could, the reputable physician refuses to prescribe one that contains cocaine. When an overseer in the South will deliberately put cocaine into the rations of his negro laborers in order to get more work out of them to meet a sudden emergency, it is time to have some policy of accounting for the sale of a drug like cocaine.

It is also extremely important to regulate the sale of the hypnotic coal-tar derivatives. All the group of hypnotics should be buyable only on a physician's prescription. They all disturb heart action and impoverish the blood, thereby producing neurotics. No physician, without making a careful examination, will assume the responsibility of prescribing for a man who comes to him in pain, yet a druggist does so constantly. He knows nothing of the customer's idiosyncrasy; that, for instance, an amount of veronal which would not ordinarily affect a child may create an intense nervous disorder in a particular type of adult. To the average druggist a headache is only a headache; he does not know that what will alleviate one kind of headache is exceedingly bad for another kind, and furthermore it is not his business to warn the customer that a particular means of headache alleviation

may perhaps make him a nervous wreck. The patient usually has the same ignorance. In a case which was once brought to my attention, a girl swallowed nine headache powders within one hour. Had there been ten minutes' delay in summoning a doctor, she would have died; as it was, she was seriously ill for a long time.

These, then, the narcotics, cocaine, and the hypnotics, are the chief habit-forming drugs. They form habits because it is necessary to increase the dose in order to continue to derive the apparent benefit obtained from them in the beginning, and because, when once the habit is set up, it cannot be terminated without such acute discomfort that virtually no one is ever cured without medical help. In drug addictions the condition of the patient is not mental, as is generally supposed, but physical. Definite medical treatment to remove the effects of the drug itself is imperative, whether the victim be suffering from the drug habit alone or from that habit in a body otherwise physically disordered. With regard to the cure of the habit, as in the case of the conditions which permit of its being acquired, it may justly be said that the victims have been unfairly treated.

THE NEED OF CONTROL BY THE GOVERNMENT AND BY PHYSICIANS

The prevalence of the drug habit, the magnitude of which is now startling the whole civilized and uncivilized world, can be checked only in one way-by controlling the distribution of habitforming drugs. With the Government as the first distributor and a physician as the last, drug-taking merely as a habit would cease to be. If physicians were made accountable, they would use narcotics, hypnotics, and cocaine only when absolutely necessary. Nobody should be permitted to procure these drugs or the means of using them or any medicines containing them without a doctor's prescription. By such restriction the intense misery due to the drug habit would be decreased by nine tenths, indeed, by much more than this; for when a physician dares no longer to be content with the mere alleviation of pain, which is only nature's way of announcing the presence of some diseased condition, he will seek the more zealously to discover and remove its cause.

CHAPTER II

THE NEED OF ADEQUATE SPECIFIC TREATMENT FOR

THE Internal Revenue Reports are the only index to the extent of the drug consumption in the United States. They show for years past an annual increase in the importation of opium and its derivatives and cocaine, and for last year a very marked increase over that of any preceding year. This is not due to the increase in population; our immigrants are not drug-takers. Among the thousands of drugusers that I have treated or known, I have never seen an Italian, a Hungarian, a Russian, or a Pole. Moreover, I have met with only four cases of drug-taking by Hebrews. Few Jews except in the under-world—acquire the habit knowingly. It may become fastened upon them through the use of a medicine the danger of which they do not realize, but, once freed, they will not again come under its power. The practical sagacity of their race is their surest safeguard.

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What is commonly spoken of as the "American type," highly nervous, living under pressure, always going to the full limit, or beyond, is peculiarly liable to disorders that lead to the habitual use of drugs. We are all hypochondriacal by nature, prone to "take something" whenever we feel badly. Lack of opportunity alone, of knowledge of what to take and how to procure it, has saved many a person under severe physical or mental strain from recklessly resorting to drugs. Since the passage of the Pure Food and Drugs Act, which was intended to protect the public by requiring the express statement of any dangerous ingredients in a compound, the sale of preparations containing habit-forming drugs has preceptibly increased. It seems a just inference that the information given, instead of serving as a warning to the unwary, has been chiefly effective in pointing out a dangerous path to many who otherwise would not have known where to find it.

Women, it should be said, though constitutionally more liable than men to feel the need of medicines, form the lesser portion of the drug-taking class. In the beginning their addiction is due almost exclusively to a physician's prescription, except in the under-world.

The habitual users of drugs in the United States come from every grade of society. Professional men of the highest responsibility and repute, laborers wearying of the dullness in a mining-camp, literary men, clergymen, newspaper men, wire-tappers, shoplifters, vagrants, and outcasts—all are among the number. Strangely assorted as they are, they become yet more strangely alike under the influence of the common habit. Shoplifting is not confined to the professional thief; it is noticeable in many a drug-user who has had every moral and worldly advantage.

The major part of the habit-forming drugs used in the United States is consumed by the under-world. It would be impossible to calculate the extent of their influence. Many a record of heinous crime tells of the stimulus of a drug. But when the school-children in some of our larger cities are found to be using co-caine, and able to buy it at will, the limit of tolerance has surely been reached.

THE DRUG-TAKING PHYSICIAN, NURSE, AND PHARMACIST

Among the widely varying classes of drug-\users, three in particular are a source of the

gravest danger: the drug-taking physician, nurse, and pharmacist. \ To realize this, one has merely to recall that the drug-taker is a confirmed evader of responsibility; and the physician, of all men, is in a responsible position. He must not forget or break his appointments; he must realize the effects of the medicines he is prescribing; if a surgeon, his work must never be below its best. But the proportion of physicians that I have treated, or consulted with, suggests one specially grave danger. It is a characteristic of the drug-taker, no matter who he is or how he acquired the habit, on the smallest excuse to advise others to take the drug whenever pain or fatigue gives the slightest occasion for it. While he grows callous to everything else, he has an abnormal sympathy with suffering. Thus it will readily be seen that there are few more dangerous members of society than the physician who is addicted to a drug.

The fact that there are not more drug-taking doctors speaks volumes for the high character of the profession. The physician has such drugs constantly at hand. The more a man knows of their insidious action and the more he handles them, the more cautious he feels him-

self to be, and the more confident that he can discontinue the use of them whenever he chooses. Any fear that the layman may have of them is due less to the dread of being personally overcome than to the mystery which surrounds them; but for the physician they have no such mystery. Furthermore, by the nature of his calling he is peculiarly exposed to the need of such drugs. He is often under excessive physical and nervous strain not only because he is unable to arrange his work so as to prevent periods of too great pressure upon his time and strength, but also because in a unique manner he puts his heart into it.

An even greater danger, in some respects, is the drug-taking professional nurse. Whatever has been said of physicians both in the way of extenuation and of warning may be repeated of nurses. They have the same exposure to the habit, and, once addicted, are likely to exhibit signs of irresponsibility. They are more dangerous in that their opportunity for mischief is greater, since they are closer to the patient and able to thwart the doctor's orders with perfect "I have had several nurses on this drug case," a doctor once said to me, "and I find that they have all smuggled morphine to

my patient." This was, no doubt, an exceptional case, but the fact remains that nurses, because of their close alliance with druggists and doctors, find it comparatively easy to purchase drugs and hypodermics at any drug store without causing the slightest suspicion or reproof. Nor should one censure them too severely for clandestine compliance with the demands of a patient. It should not be overlooked that the nurse, in being paid by the patient and not by the doctor, is ordinarily subjected to great pressure when the patient clamors for morphine. In such circumstances the protection of a physician's monopoly of the drug would be most welcome. But how much worse is the pressure when the well-intentioned nurse also is a drug-taker! The morphinist has an abnormal sympathy with those who have undergone or are undergoing experiences similar to his own, and there is no stronger bond than that which unites two morphine victims. As a matter of the most elementary precaution for all concerned, no nurse should under any conditions be allowed to buy habit-forming drugs.

Another kind of drug-taker against whom physicians' distribution would be a safeguard, and the only safeguard that can be devised, is

the pharmacist. The contingency of a drugtaking pharmacist, perhaps more than anything else, will bring sharply home to the average man the menace of morphine when used by a professional person. By reason of closer and more personal observation one may feel rashly confident of his ability to detect when a doctor or a nurse is "queer," but generally the patron of a drug store has no such opportunity for observation. Addiction to a drug incapacitates the pharmacist for filling prescriptions. Often the slightest deviation from a precise formula in either quantity or ingredient is of the gravest consequence, and hence the utmost care should be used to insure the scrupulousness of one on whom such responsibility rests. As long as he is accountable to no one, or even accountable to the Government only on a business basis, there can be no safety for the public. he may sell to any purchaser other than a physician, he may always supply his own wants. But if he has to account to a physician for the entire amount of habit-forming drugs that he distributes, any leakage may quickly be detected by the man who more than any one else can be relied upon to stop such a leakage promptly and sternly. A pharmacist should be allowed to dispense habit-forming drugs only on a physician's prescription.

The physician should be limited as to his authority not only for prescribing such drugs, but, as the Boylan Act provided, there must be a careful accounting on his part for all such drugs administered or given away. In other words, he must account for all such drugs which he buys for office use, and he cannot prescribe such drugs except under certain definite limitations.

METHODS OF TREATMENT: "THE HOME CURE"

For many years only two methods of dealing with the drug habit were known. They continue to be the only ones in general use to-day. They are the "home cure" and the sanatorium method. Neither is in any proper sense a treatment or anything more than a process of substitution and deprivation.

In many of the periodicals and daily papers are carefully worded advertisements setting forth that a man may be cured of a drug habit quickly, secretly, painlessly, and inexpensively. These are written by people who thoroughly understand the mental and physical condition of the drug-taker. In almost all cases he wishes

to be freed from the habit, but at the same time to avoid the disgrace of being classed with "drug-fiends": he is unwilling that even his family or his intimates should know of his condition. He has an exaggerated sensitiveness to pain, upon which also the advertisement relies. Furthermore, attention is directed to the fact that the patient may take the alleged remedy without spending much more money than he has been spending for the drug itself, naturally a powerful appeal to a man of limited means. Moreover, the people who take these "cures" are generally those who are unable to consider the expense of leaving home. That the advertisement is very alluring to the average drugtaker is shown by the fact that in my entire practice I have encountered few patients who have not at some time or other taken a home cure.

A minister wrote to me the other day begging me to cure a fellow-minister of the cure habit. His friend had had occasional attacks of renal colic, and a physician had eased their acuteness with a hypodermic. The patient of course knew what he was taking, and since he was forced to consider the cost of the physician's visits for the mere administration of the hypodermic, he naturally procured his own outfit, and in a short time was using it regularly upon himself. When he found that he could not leave off the practice he entered into correspondence with a succession of "home-cure" advertisers, whose clever use of the word "privacy" offered a hope that his condition might be concealed from his congregation. For ten years he had been undergoing the cures, and during all this time had been forced to take a regular dosage of the so-called remedies.

Before the passage of the Pure Food and Drugs Act the ingredients of such remedies were not stated. The patient seems never to have suspected the truth—that the bottle contained the very drug he had been taking, its presence disguised by added medicines. In certain instances the makers boldly advertised that a trial bottle would be sufficient to prove clearly that the taker could not get along without using his drug. Now that the law compels a list of dangerous drugs on the label, the cures proceed admittedly by a reductive principle. The patient graduates from a number one bottle to a number two, containing less opium, and so on, until finally he is supposed to be cured. The proprietors of these cures make a great deal of capital out of the fact that the reduction is so gradual that the taker experiences no discomfort. This consideration is highly effective, for while it irresistibly appeals to the morbidly sensitive morphinist, it also makes him comprehend, as time goes on, why the process of cure is so slow. It is hardly necessary to state that the final stage is almost never reached.

Almost without exception, the basis of restoration to health is the perfect elimination of the effects of the drug. It should go without saying that it is impossible to eliminate the effects of opium with opium or to find any substitute for opium that is not itself opium. At the International Opium Conference in China I exhibited seventy-six opium-cures which I had had analyzed and found to contain opium; and as a consequence of the Pure Food and Drugs Act all the American "cures" announced on their labels that they also contained it. Thus it is easy to see why the sale of these cures had always greatly increased wherever the rigid enforcement of anti-opium enactments had closed up the customary sources of habit-forming drugs.

Up to the passage of the act, however, the

presence of opium in the American cures was concealed, and their formulas were kept secret; and hence all of them, by the very nature of the case, were put forth either by irresponsible persons or by persons outside the pale of the profession; for one of the pledges given by a physician is that he will not patronize or employ any secret treatment, and that he will give to the profession whatever he finds to be of benefit to his fellow-men.

In very rare cases these home cures have been able to relieve a man of strong will power, with the added assistance of a regimen for building up his bodily tone. But these cases have been so infrequent as to be virtually negligible, for to administer the treatment successfully demands from the patient the exercise of precisely that power of self-control the loss of which drove him to the cure in the first place. If there ever was any curative property in one of these so-called cures, a man could not be benefited unless he were under constant supervision. A treatment of this sort must, except in case of a miracle, be administered by another and under continuous medical surveillance. A man addicted to a drug, be he physician or longshoreman, in a short time becomes utterly unable to deal justly with himself, for it is the nature of the drug to destroy his sense of responsibility.

THE SANATORIUM TREATMENT

Besides the home cure there was, and is, the sanatorium treatment. Unlike the former, this was first established and carried on by trustworthy medical men, who depended for their support upon the patients of reputable doctors. A physician who had a morphine patient was obliged to send him to a sanatorium because there was nothing else to be done with him; elsewhere no course of treatment under constant surveillance could be given. It afforded the only opportunity of carrying the patient through the long period of gradual reduction which was then the only known treatment. Thus there was nothing optional about the matter; the physician could not recommend a home cure, and the only means of approximating systematic treatment was the sanatorium. Furthermore, those relatives and friends who knew of the patient's condition were anxious that he should go to one, since they realized the increasing awkwardness of keeping him at home. In many cases, indeed, they even went so far as

to resort to means of commitment, if they failed to get his voluntary coöperation. It is due to the ease with which this type of patient can be committed that the State of Connecticut, for instance, abounds in sanatoriums. In that State, when a patient has entered one of them, he can often be detained there virtually at the pleasure of his relatives and friends.

The method of treatment at most of the sanatoriums is like the home cure, except that it is under surveillance; that is, it is merely one of gradual reduction accompanied by an upbuilding of bodily tone. The morphine-taker with means and time at his disposal will stay in a sanatorium as long as he can be made comfortable. This shows that whatever reduction be has undergone is extremely slight; for gradual reduction, when it is carried to any extent, sets up a highly nervous state, together with insomnia and physical disturbance. The patient, as is often said, has an exaggerated dread of discomfort, and will not, if he can help it, endure it at all. Unless he is committed, he transfers himself to another sanatorium the moment he ceases to be made comfortable. I had one patient whose life had been a continuous round of sanatoriums. He would stay in one place until the point was reached where discomfort was in sight, and then remove to another, remaining there for a similar period, and then to another, and so on, until he had finished a long round of sanatoriums to his taste in America and Europe. Then he would begin all over again.

A patient of mine who had visited eight different sanatoriums in the vicinity of New York told me that in America the sanatorium treatment of neurological patients was divided into three great schools: the "forget-it" system, the "don't-worry" system, and the "brace-up" system. Any nervous invalid who has stayed much at sanatoriums will appreciate the humor of this classification.

The gravest aspect of these long stays at a sanatorium is the unavoidable colonization. Picture to yourself a group of from half a dozen to fifty morphine patients, eating together, walking together, sitting on the veranda together, day in and day out. In this group are represented many different temperaments and many different stations of life, from the gambler to the clergyman. All the more on this account is there a general and eager discussion of previous history and present situa-

tion. For where the alcoholic is quite indifferent, the morphine victim has an insatiable interest in symptoms. He has also an excessive sympathy with all who have been through the same mill with himself. Thus, in a matter where individual and isolated treatment is imperative, most sanatoriums deal with patients collectively. Furthermore, these are peculiarly a class of unfortunates who ought never to become acquainted. Whatever moral restraint the habit has left in a man is completely relaxed when he hears constant bragging of trickery and evasion and has learned to envy the cleverness and resource so exhibited. The selfrespect and pride which must be the main factors in his restoration are sometimes fatally weakened. Colonization should be restricted to the hopeless cases, and to them only because it is unhappily necessary.

FAILURE OF THE REDUCTION METHOD

All this, moreover, is never, or almost never, to any purpose. As the uncomfortable patient will move if possible, it is naturally the business of the sanatorium to keep him from being uncomfortable. The method of reduction, therefore, is rarely carried out to the point where it

would do any good, even if good were thus possible. But it is not possible. In the first place, lessening the dose is of little avail; there is as much suffering in the final deprivation of a customary quarter of a grain as of twenty grains. In the second place, it cannot be ascertained by gradual reduction whether there is any disability which makes morphine necessary, since no intelligent diagnosis can be made so long as a patient is under the influence of the smallest quantity of the drug. Obviously, the first step in taking up a case should be to discover whether any such disability is present, and, if so, whether it is one that can be corrected; otherwise it may be a waste of time to try to correct it. The true physical condition of the patient, which should be considered before a long course of treatment is undertaken, can seldom be discovered by the reduction method.

The best doctors have always felt that they could not afford to lend their names to any institutions or sanatoriums except those which restricted themselves to mental cases. Yet these home cures and sanatoriums, unscientific and ineffective as they were, have offered to the victims of the drug habit the only hope they could find. The investigations begun by Mr. Taft in the Philippines extended over considerable time and cost two hundred and fifty thousand dollars, but, although furthered in every way by the whole world, they failed to discover a definite treatment for the drug habit. It was generally believed by physicians that there was no hope for the victims of it.

COST OF THE DRUG HABIT

It may be noted that I have not dwelt upon the expense of the habit. This consideration may be omitted from the case. To the average victim, the cost of his drugs, no matter what he may have to pay for them, seems moderate. He is buying something which he deems a vital necessity, and which, moreover, he places, if a choice be required, before food, drink, family, sleep, pleasures, tobacco—every necessity or indulgence of the ordinary man.

The real cost is not to the drug-taker, but to the world. If a human life be considered merely as a thing of economic value, an estimate may perhaps be made of the total loss due to the habit.

But the loss should not be reckoned in any such way. It should rather be reckoned by the great amount of moral usefulness and good that might be rendered to the world if these unfortunates could be freed from their slavery, and by the actual harm being done by them, especially by those that are now loosely classed as criminals and degenerates.

The retrieving of much of the waste of humanity may be accomplished by adequate treatment of the drug habit.

CHAPTER III

THE DRUG-TAKER AND THE PHYSICIAN

THE doctor who begins to take the drug in order to whip his flagging energies into new effort finds the habit fastened on him before he realizes what has occurred. His endeavors to reduce his daily dosage fail, and he becomes thoroughly enmeshed. His acquired tolerance for the drug has brought about so great a physical change that deprivation or even reduction of dosage is intolerable. Hundreds of cases where physicians had experimented with the drug with these disastrous results have been brought to my attention.

No one shows less foresight, less appreciation of the danger of tampering with drugs, than the physician himself. I am constantly amazed by the fact that any doctor will take even the slightest risk of becoming a drug-user. That many voluntarily incur the peril passes my understanding.

I have seen an astonishing number of physi-

cians who for various physical reasons other than exhaustion and the need of stimulant considered themselves eligible to experiment with drugs. It is a curious thing that, as a class, physicians and surgeons are themselves singularly averse to submitting to surgical operation, even when symptomatic indications strongly urge it. Why surgeons, in particular, should so generally dread the application of the knife in their own cases is a puzzle, for of course no class more thoroughly understands the need of surgery. I could mention many cases of this sort, but one in particular recurs to my memory. He was one of the most careful and bestinformed doctors in the country, and he was not without a certain special knowledge of the peril involved in habit-forming drugs; but he suffered from a painful rectal trouble, and although he considered himself too intelligent a man to go too far with a dangerous substance, he did go too far. He had thought that he could leave drugs off whenever he desired; he found that he could not.

THE PHYSICIAN WHO TAKES DRUGS

It is impossible to make even an approximately accurate guess at the proportion of physicians who are drug-users. Everywhere except in New York State physicians can obtain as many drugs as they desire without publicity and without laying themselves open to any penalty whatsoever, even if their purchases are brought to official attention. No medical organization takes any cognizance of drug-taking physicians or provides any medical help for them. It is highly probable that the New York State legislation may uncover some of the drugtaking doctors in that commonwealth, though this is by no means certain, since legislation in force in only one State cannot effectively put a stop to the illegal importation of habitforming drugs from other States and countries. Proper restrictive legislation of sufficiently wide scope would very quickly disclose every drugtaking doctor in the nation, and either force him to correct his physical condition or drive him from the profession. Proper general regulation of the traffic and consumption of habitforming drugs will aid tremendously in freeing the medical profession from drug-takers. Until this general regulation exists no general reform will be possible. An exact accounting for every grain of habit-forming drugs which he purchases, possesses, or administers, must be demanded of every physician in the United States before this evil can be entirely abated; and this accounting among physicians will be impossible until a similar accounting is demanded of every grain imported, manufactured, and dispensed by wholesale and retail druggists.

Concerning the extent of the hold which the drug habit has upon physicians I have had a rare opportunity to judge. Not only has my dealing with the drug habit been as exclusively as possible through the physician rather than through the patient, but the brevity of my treatment and the privacy that my patients are assured make it possible for many physicians who have become afflicted to come to me for relief without arousing in the mind of any one a suspicion of the real cause for their brief absence. I therefore feel that I have a firm basis for accuracy.

It is the fear of disgrace which has driven hundreds of physicians from bad to worse with the drug habit: they have become apprehensive that any effort tending to their relief will uncover their position to their families, associates, or patients, and thus bring ruin; so they have drifted on from bad to worse. Many who have not taken steps in time have reached the irresponsible and hopeless stage. To the medical profession in general, as well as to the public, these men are a dreadful menace.

ATTITUDE OF THE PROFESSION

I, a layman, have been greatly surprised that the medical world shows so little sympathy for these unfortunates. This seems to me to be specially reprehensible, since by this neglect they imperil the public. No greater service could be rendered to mankind by the medical profession than a concerted movement of the medical organizations toward the care and relief of those among their drug-taking members who are still susceptible to help, and the exclusion from medical practice of those who have already gone too far to be reclaimed. Physicians of this class who are without means are specially entitled to sympathy and help, and this service will be of double value, for it will not only give them necessary aid, but will notably safeguard the public. No physician should be permitted to practise who is addicted to the use of habit-forming drugs or who uses alcoholic stimulants to excess; but whatever is done in regard to these men should be accomplished without publicity and without any loss of pride or

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standing. A doctor who has used either drugs or alcohol is much more to be pitied than blamed.

The worthy practitioners—and there are many-who must resort to the use of drugs in order to enable them to practise despite some physical disability which cannot be eliminated, are no less numerous in proportion to the total number of physicians than similar cases are in relation to the total number of lawyers, merchants, or journalists, but because of the nature of their work, they are far more dangerous to the general public. It seems to me that there is in this fact—the existent, non-elimination of such perilous characters from the practice of medicine, and the obvious, very real necessity for such an elimination—a suggestion for some person of philanthropic mind. If the medical profession will not care for its own, then some one else must care for them. It occurs to me that among the people whose naturally fine impulses are leading them toward the endowment of institutions for the care of the aged maiden lady, or superannuated teachers, or others to whom fate has been unkind, there are many who might well consider this great need for the establishment of a comfortable institution in this

country for the care of physicians who through no fault of their own have become unable to practise their profession with profit and efficiency.

HOW THE DOCTOR BECOMES A DRUG-TAKER

The doctor's yielding to the drug habit is a simple process, in ninety-nine cases out of a hundred unaccompanied by any unworthy tendency toward dissipation. In another part of this book I make extensive reference to the fact that nowhere in the text-books by means of which the medical students of the world receive their education is any proper attention paid to the psychology of the drug habit. We may assume that a doctor, having lost sleep because of a difficult case, is confronted on his return to his office by another that demands immediate and skilful attention. He is tired and very likely he himself is ill. He cannot yield to his worries or illness, as he would demand one of his patients to yield. He must "brace up." knows that in the stock of habit-forming drugs that he uses in his profession lies the material which will brace him up. He tries it; it succeeds.

This doctor has begun to nibble at the habit,

and he does not know his danger. He himself does not believe that one or two or a few doses will fasten that habit upon him. He finds that a certain dosage produces the necessary desired result upon the first day; he is stimulated to new efforts in behalf of his patients, and because those new efforts are the result of stimulation, they produce abnormal weariness. This exhaustion must be overcome, and the result is another dosage of the drug; and this time the dosage must be larger than the first, for both his toleration for the drug and his weariness have increased. Only a few days of such experiences are necessary to fasten the habit upon him.

I have often endeavored to imagine the thrill of horror which must chill a doctor's soul when he finds that this has happened. His position is a dreadful one. He has lost control. He must tell no one, for if he tells, disgrace and the loss of his means of livelihood will be but matters of a short time. He knows nothing of any means of real relief; he cannot help himself; he is familiar with the dangers attendant on the fake cures which are widely advertised. He is confronted by a stone wall. He must either continue his dosage, thus enabling him to

keep on with his practice, or he must accept ruin and defeat; and to continue his dosage is the easiest thing imaginable, for the drug has been by law intrusted to his keeping and is close at hand.

Another doctor who is specially susceptible to drug addictions is the one who has been accustomed to alcoholic stimulation. Any doctor who drinks alcohol, when he finds himself beset by arduous labor involving loss of sleep, or is confronted by cases of such a complex nature that they involve a great deal of mental worry on his part, is likely to drink more than usual. Thus work and worry, the two things which make him most liable to the evil effects of any stimulation, are likely to drive him directly into over-stimulation.

Over-stimulation results in super-nervous excitation. The victim finds himself unable to sleep, he finds his hand tremulous, he finds his thoughts wool-gathering when they should be concentrating with intensity upon his work. In his pocket case there is his little morphine bottle; he knows its action, and when called to see a patient while under the influence of alcoholic stimulants he attempts to steady himself by the administration of a small dosage.

The result is virtually instantaneous and at first marvelously effective. He finds himself enabled to do better work than he has done for years, and more of it. The remedy seems magical; he tries it again and again. The man is lost.

Such instances as these have produced the most utterly hopeless of the many cases of drug addictions among physicians with which I have come into contact.

TYPES OF DRUG-USERS

Specially numerous among drug victims are physicians in nose and throat work, where they make daily employment of cocaine solution. Some of the most desperate cases of drug habit that I have ever seen among physicians have come from this class, made familiar with the constant use of the drug by the necessity for continually administering it to their patients.

Another physician who is specially liable is the man who suffers severe pain from a physical cause that he knows can be removed only by resorting to surgery. The average doctor will postpone a surgical operation upon himself until his condition has long passed the stage that he would consider perilous to any of his patients. While he postpones it he is suffering, and while he suffers he may be more than likely to continue his practice through reliance upon the stimulation and pain-deadening qualities of habit-forming drugs, concerning the true and insidious nature of which he usually knows no more than the average layman.

There have been a few cases of physicians who have yielded unworthily to drugs and opiates as a means of dissipation. I have known some physicians, for example, who have been opium-smokers. In the United States the opium-smoker is invariably unworthy. Not long ago the New York police raided the apartment of a physician where were found thirty or forty opium-pipes and more than a hundred pounds of opium, either crude or prepared for smoking. I have known fewer than half a dozen physicians whose drug vice was purely social. however. The victims of drug habit who achieved it through a tendency toward dissipation are almost invariably denizens of the under-world; and if it were not for the fact that the contagion of their vice may spread, they might well be permitted by society to drug themselves to death as speedily as possible.

We shall entirely disregard the physician

who becomes addicted to the use of drugs through unworthy tendencies, and consider only the dangers to the profession and the public latent in the case of the physician who becomes addicted in the less reprehensible, but more dangerous, manner that I have indicated. Not only will such a drug addiction injure the doctor's practice and threaten his career, but it will surely constitute a threat against the welfare of his patients not included in the possibility that through it he may miss engagements, write improper prescriptions, and make mistakes of many kinds.

THE DRUG-TAKING PHYSICIAN A MENACE

A very serious danger lies in the psychology of drug addictions. The person who has taken a habit-forming drug for the purpose of relieving his own pain, and through it has found that relief which he sought, is almost certain to become abnormally sympathetic to the suffering of others. It is a curious fact that this doctor will be more than likely to administer the drug he uses to his patients, not with malicious, but with probably friendly, intent, and that he will feel no scruples whatsoever in acting as a gobetween for drug-users in general who find

themselves unable to obtain supplies easily. He will do what he can to help confirmed users to obtain their drugs, even if he makes no profit out of it. He will write prescriptions for them in evasion, if not in violation, of the law. It is a curious and tragic fact that the drug-taking doctor will spread the habit in his own family.

There have been many instances in my hospital when I have had a physician and his wife as patients at the same time and on the same floor. In every one of these instances the drug addiction of a wife has been the direct result of constant association with the drug-addicted husband. No more dangerous detail exists in the psychology of drug-users than their almost invariable tolerance for the habit in others and their sympathetic willingness to promote its spread among those who suffer pain. In the under-world the drug habit never travels alone. Through it the woman who is a drug-user holds the man whom she desires; through it the male drug-taker holds the woman whose companionship he finds agreeable. It is a curious fact that while in the under-world the drug habit has become a social vice, especially in the case of cocaine, and is frequently a proof of mixed sexrelations, in the upper-world it is accompanied by a secrecy of method and sequestration of administration that characterizes no other form of vice.

The difference between the psychology of the doctor's relation to the drug habit and that of the layman to it may be summed up in the statement that while the layman does not at all know what he is getting, the doctor knows what he is taking, but thinks that he can stop taking it whenever he feels ready. It is probable, therefore, that the doctor's primary danger is as great as the layman's, and it is certainly true that his secondary danger—that growing out of the fact that he has drugs and the instrument for their administration always ready to his hand—is very much greater.

The unnecessary administration of habitforming drugs to the sick must be legally prevented as far as possible. No affliction which can be added to an already existing physical trouble can compare in horror with that of a drug habit. Numbers of cases have come under my observation in which physicians have accomplished exactly this addition to the ruin of their patients' health, to the incalculable distress of the sufferers' families, and to the vast loss of society. In the recent legislation written upon the statute-books of New York State the first definite effort is made to provide against this catastrophe.

CHAPTER IV

PSYCHOLOGY AND DRUGS

RUG habits may be classified in three groups: the first and largest is created by the doctor, the second is created by the druggist and the manufacturer of proprietary and patent medicines, and the third, and smallest, is due to the tendency of certain persons toward dissipation.

The major importance of the first two groups is due to the fact that they include by far the greater number of cases, and to the pitiful fact that such victims are always innocent. Speaking generally, and happily omitting New York State from our statement, it is safe to say that the manufacturer, the druggist, and the physician are without legal restraint despite their importance as promoters of drug habits, while the comparatively unimportant drug-purveyor in the under-world is held more or less strictly in control by the police, and is subject to severe

punishment by the courts in case of a conviction.

With few exceptions, the part which the doctor plays in the creation of drug habits is due to lack of knowledge; but the druggist's part in the spread of this national curse is purely commercial, and may justly be designated as premeditated. He always has gone and always will go as far as is permissible toward creating markets for any of the wares that he sells.

Regulation of the upper-world in regard to the distribution of habit-forming drugs will automatically regulate the under-world in its similar activities. The amount which will be smuggled by those of criminal tendencies always will be small as compared with the amount improperly distributed through channels now recognized as legitimate until all the States have passed restrictive legislation founded upon, modeled after, and cooperative with New York State's legislation; and all this must be backed and buttressed by Federal legislation of a special kind before real and general good can be accomplished in the United States. Illicit drugs rarely find their way into the possession of users who have acquired drug habits through illness or pain. So it must be admitted that most of the effort that in the past has been made toward restrictive legislation has really been devoted to the interests of the unworthy rather than to those of the worthy. Save in New York State, the man or woman with a sheep-skin—the doctor, the druggist, or the nurse—remains virtually a free-lance, permitted to create the drug habit in others or in himself or herself at will.

THE DOCTOR A MEANS OF SPREADING THE DRUG HABIT

The man in severe pain is immediately exposed, by the very reason of his misfortune, to the physician with a hypodermic or the druggist with a headache powder; the man who cannot sleep may at any moment be made a victim by the physician whom in confidence he consults, or by the druggist to whom he may foolishly apply for "something" which will help him to secure the necessary rest. Save in New York State, the druggist's shelves are crowded with jars and bottles holding dangerous compounds which he may dispense at will, his drawers are crowded with neat pasteboard boxes containing powders which are potent of great peril. The public will have made a long step toward real safety when

it realizes that any drug which brings immediate relief from pain or which will artificially produce sleep is an exceedingly dangerous thing.

The sick man's confidence in his doctor is one of the doctor's greatest assets; it has saved innumerable lives. It is of the same general nature as the mysterious mental phenomena which frequently control physical conditions, and which have been capitalized by various bodies, such as Faith Cure and Christian Science; but if this is an asset to the physician, the general public knowledge that he carries in his case or in his pocket drugs which he can use without restraint of law for the relief of pain may become a general peril. In the old days when the doctor's work was a mysterious process, operating by methods of which he alone was cognizant, this peril was less well defined; but now that the spread of education has made everybody a reader and periodical literature of the times has given even children a smattering of knowledge concerning medical matters, the nature of the means by which the doctor works his miracles is well known, and his unrestraint may become a public peril.

Of one thousand patients who may consult the

average physician, nine hundred and ninety-nine know perfectly well that he can stop their pain if he desires to do so. Pain is unpleasant; naturally their demands that he use his power are insistent. If he refuses, they are likely to call in another and less scrupulous physician. The medical profession is overcrowded, and perhaps the doctor needs the money. Even if he is swayed by nothing but financial need, he is likely to be tempted into the administration of pain-deadening substances when his patient urges him.

There is another powerful influence which works upon the most admirable of men—the pity of the temperamental physician for the human sufferer. Most men who choose the medical profession as the avenue for their life-work have the qualities of mercy, pity, and sympathy notably developed in their psychology. This is likely to induce them to stretch points in favor of relieving suffering patients. Even when their previous experience has proved to them the danger lying in narcotics, they are likely to forget it, or to take a chance if a special emergency arises. This may be done without great peril to the patient.

DANGER OF THE KNOWLEDGE OF PAIN-RELIEVING DRUGS

The physician should exhaust every means known to medical science to prevent his patient from knowing what it is that eases pain when his practice makes it absolutely necessary that a substance of the sort should be administered, and this is very much less frequent than the average doctor realizes, as will be shown in another passage of this book. It is in this necessity for concealment that the great danger of using the hypodermic syringe as an administrating instrument principally lies. The moment the hypodermic syringe is taken from the doctor's or the nurse's kit, the sufferer is made aware of the means which will be used to give him ease. He remembers it, forming a respect and admiration, almost an affection, for the mere instrument, and with the most intense interest gathers such information as he may find it possible to acquire about this wonder-working little tool and the material which is its ammunition of relief. He knows absolutely that the relief which he has found is not due to medical skill, but to the potency of a special drug administered in a special way. He stops guessing as

to whether he has been soothed by an opiate; he knows he has been.

It is not only those of weak psychology or mental characteristics who are affected by this knowledge and who through it become drugtakers, though it is the general impression that this is the case. No impression was ever more inaccurate. The mentally strong and the morally lofty are as much averse to suffering physical pain as the mentally weak and the morally degenerate. All are in the same class when the drug has been administered until that point of tolerance is reached where its administration cannot be neglected without the indignant protest of the physical body. That this fact should be impressed upon the medical profession as a whole is one of the most needful things I know.

Another hazard which the doctor runs, if he passes the point of extreme caution in the administration of drugs to patients, is the possibility, even the probability, that through such an administration he will lose control of his patients. From the moment the patient becomes cognizant of the means which the doctor has successfully used to alleviate his pain, he begins to dictate to the doctor rather than to

accept dictation from him. No doctor can control a case successfully unless his judgment is accepted as the supreme law of treatment. A patient who is not susceptible to the doctor's dictation cannot be expected to get the full advantage of the doctor's skill or knowledge. If diagnosis shows that a patient requires some operation, as in certain uterine troubles, or more especially in the case of bladder affections or gall-stones,—cases in which frequently only an operation can give relief,—and if that patient is aware that even if the operation is not performed, the doctor can still ease all suffering, that patient, loath to run the risk of the surgeon's knife, horrified by the thought of hospitals and operating theaters, is likely to demand the relief which opiates offer, and refuse to risk the cure which surgical procedure alone would certainly afford.

The conscientious doctor who insists upon the proper course in such a case is seriously handicapped by the presence in the medical profession of many men who are less conscientious, and who may yield more readily to the urgings of the patient. Thus the possibility of unrestricted use of habit-forming drugs by the medical profession becomes a handicap to the con-

scientious man and a commercial advantage to the unscrupulous practitioner.

UNCONSCIOUS VICTIMS OF THE DRUG HABIT

Episodes occurring continually in the course of my work add to the strength of my conviction of the physician's responsibility. For years not a week has passed which has not brought me patients with stories of the manner in which they have become victims of drug addiction through the treatment of their physicians. ing before me as I write is a communication from a young man in Pennsylvania. He had been hurt, and through improper surgical attention a healing fracture had been left intensely painful. The attending doctor, unable to correct his imperfect work, had left with him a box of tablets to be taken when the pain became severe. Promptly and inevitably the youth achieved the drug habit. He felt disgraced, he would not tell his father, his wife, or his sister. His doctor could give him no relief. By some accident he saw an article of mine which was published in the "Century Magazine," and made a pitiful appeal to me. I have received many such communications.

A pathetic letter comes to me from a woman

suffering with fistula. Having achieved the morphine habit as the direct and inevitable result of taking pain-killing drugs given to her by her family physician, she now feels herself disgraced. Like many sensitive women who in this or some other way become victims of the drug habit, she is obsessed, as her letter clearly shows. with the conviction that her achievement of the habit has been a personal sin, and that her continued yielding to it puts her beyond the pale of righteousness. She writes that she finds herself incapable of going to her church for Sunday services or to prayer meetings because she feels ashamed when in the imminent presence of her Maker. Another woman, evidently animated by a similar psychological phenomenon, writes that having acquired the drug habit, although blamelessly, since it was through the administration of narcotics by her doctor, she finds it a psychological impossibility to kneel at her bedside and offer that prayer to God which it had been her nightly practice to deliver.

I could multiply such instances indefinitely. It is impossible to conceive any episodes more pitiful than the cases of this sort which have been detailed to me by drug victims,

doctor-made. That feeling of disgrace, that unjustified conviction of sin on the part of absolutely innocent women victims of the drug habit, is apparently among the most terrible of humanity's psychological experiences. If I had the pen of a Zola and the imagination of a Maupassant, I might properly impress the medical world with a sense of its responsibility in this matter. Without it I fear that I may fail to do so; but could I accomplish only this one thing, I should feel that my life had been of use to that humanity which I desire above all things to serve.

No work could be of more importance to the world of sufferers than one which would put the use of these potentially beneficent, but, alas! often injurious, drugs upon a respectable basis, so that the man who must be given the relief which they alone can offer may no more hesitate to tell his neighbor that he is taking morphine than he now will hesitate to tell his neighbor that he is taking blue mass pills or citrate of magnesia.

RESPONSIBILITY OF THE TRAINED NURSE

That the medical world should ever have been so lax in its realization of its proper responsibility as to allow trained nurses to carry

hypodermic syringes and to administer habitforming drugs seems to me to be one of the most amazing things in the world. No physician who has had an extensive experience with drug addiction and who has any conscientious scruples whatsoever will fail to make sure before he leaves a nurse in charge of a patient that the attendant possesses no habit-forming drugs and is without any instrument with which they may be hypodermically administered. If such drugs are to be used, they should be kept in the physician's possession until they are used, and should be administered by means of an instrument which he carries with him. When such drugs are left, the nurse should give an accounting for every fraction of a grain.

I have no desire to convey the impression that in my opinion all nurses are untrustworthy or unscrupulous, but it must be remembered of them, as it must be remembered of the doctor, that they are in the employ of the patient, that their income depends upon giving satisfaction to their employer, and that they are likely to make almost any kind of concession and resort to almost any practice in order to make comfortable and profitable assignments last as long as possible. It is impossible not to admit the truth of this statement, and it must be recognized that if it is true, a nurse is under too great a responsibility when she is in possession of a hypodermic kit, particularly if the patient knows that it is her kit, her hypodermic, her drug, and that she will not be called to account by the physician for such drugs as she may administer. It must be rather disconcerting for a physician to reflect upon the fact that a nurse whom he has left in charge of a critical case, through greed or even through the general and admirable quality of mercy, is equipped for, and ignorantly may yield to the temptation of, resorting to a practice that may not only undo all the good his treatment has accomplished, but, in addition, may afflict the patient with suffering more terrible than any which disease could give. This element of mercy, soft-heartedness, and readiness to pity must specially be remembered in considering the relation of the trained nurse to the patient. If men are often induced to enter the medical profession because of its presence in their soul, even more frequently are women led by it to become trained nurses. The sympathetic woman is even more likely to yield to the pleadings of suffering patients than is the sympathetic male doctor.

It must also be remembered that, like the doc-

tor, the nurse is human, and neither iron-nerved nor iron-muscled. She is frequently under terrific strain, which makes her tend toward the use of stimulants of any kind. That which she can administer to herself by means of the hypodermic is closest to her hand, is easiest to take, and is least likely to be discovered. Again, too, it must be remembered that the nurse is as susceptible to pain as are the rest of us. Suffering, with the means of alleviation at her hand, and, like the doctor, ignorant of its true peril, what is more natural than that she herself should use the hypodermic for her own relief? Thus it comes about that probably a larger proportion of trained nurses than of doctors are habitual drug-users. This is not a statement which is critical of the profession, for if all mankind knew of drugs, had hypodermics, and knew how to use them, a very large proportion of the human race would resort to this quick and effective, if inevitably perilous, means of finding comfort when agony assailed them.

The world does not, the world cannot, understand that while to the normal human being the worst that can come is pain, the worst pain is vastly less terrible than the horrors which at intervals inevitably afflict the habitual drug-

user. Not one human being who has become a victim of a drug habit through its use for the alleviation of pain but will voluntarily cry after he has come to realization of the new affliction which possesses him, "save me from this drug habit, and I will cheerfully endure the pain which will ensue." The horror of pain is not so great as the horror of the drug habit.

Another very serious reason for extreme caution on the part of the medical profession in regard to the use of habit-forming drugs is that the effect of such drugs upon a patient must almost certainly make accurate diagnosis of his case difficult or even impossible. A patient whose consciousness of pain is dulled or eliminated by the use of drugs cannot accurately describe to a physician the most important symptoms of his ailment. Without the assistance of such a description the physician is so handicapped that all the skill which he has acquired in practice and all the knowledge he has gained from study are apt to be of no avail. Indeed, in the case of habitual drug-users accurate diagnosis of any physical ailment is impossible until the effect of the drug has been so completely eliminated that not one vestige of it remains.

CHAPTER V

ALCOHOLICS

AM not specially familiar with the statistics of insanity, but I am inclined to believe that an appreciable contribution to the total—indeed, one of its largest parts—has arisen from the improper diagnosis of drug and alcoholic cases, followed naturally by improper medical treatment. Lack of definite medical help in cases of chronic alcoholism is likely to bring about brain lesions, which eventually mean hopeless insanity.

For that special reason, the chronic alcoholic has been the chief contributor to the army of the insane, and in the asylums his presence is notably frequent among the violent cases. The head of one of the greatest institutions in the United States for the care of the insane assures me that this seems to occur among women to a greater degree than with men.

One of the most difficult problems of my work has been to discover ways by which the medical profession can be made to understand the really serious meaning of chronic alcoholism. Most delirium, the primary cause of which lies in alcoholism, is amenable to treatment.

EFFECTS OF DEPRIVATION IN CHRONIC ALCOHOLISM

It is exhaustion or lack of alcohol which first produces delirium in an alcoholic case, whether that exhaustion is due to the patient's inability to assimilate food or alcohol or whether it is due to the fact that, being under restraint, alcohol is denied him.

In most cases there is no form of medication which can be successfully substituted for alcohol, and unless definite medical help is provided for the purpose of bringing about a physical change and thus avoiding delirium, no course remains safe except a long and very gradual process of reduction of alcoholic poisoning. Such a measure as this cannot be successfully applied in the wards of the general hospital, as the mere fact that alcohol was there administered, even in slowly diminishing doses, would make such a ward the chosen haven of imnumerable "old stagers," who, having reached that stage of worthlessness which would make it impossible for them to obtain the narcotic else-

where, would take the treatment for the mere sake of getting the alcohol of which it principally consists.

Many friends of alcoholic subjects and many physicians in private practice have believed that they were doing the alcoholic a great service when they put him where he could not get alcohol, and helped him over the first acute stages of the period of deprivation by the administration of bromide and other sedatives. This usually means delirium first and then a "wet brain"; if the patient survives this, his next development is more than likely to be prolonged psychosis, or, in the end, permanent insanity. It is because of this that I consider the chronic alcoholic more clearly entitled to prompt and intelligent medical treatment than most other sick persons. With the alcoholic, as with the drug-taker, the first thing to be accomplished is the unpoisoning of the body. In order to accomplish this, it is first necessary to keep up the alcoholic medication, with ample sedatives, using great care lest the patient drift into that extreme nervous condition which leads to delirium. If delirium does occur, nothing but sleep can bring about an improvement in the patient's condition. This is the point of development at which physicians not properly informed in regard to such cases are likely to employ large quantities of hypnotics, and frequently this course is followed until the patient is finally "knocked out." In many instances an accumulation of hypnotics in the systems of persons thus under treatment has proved fatal. I am rather proud of my ability to state that from delirium tremens I have never lost a single case.

NECESSITY OF CLASSIFICATION OF ALCOHOLICS

The records show that to-day about forty per cent. of the insane in the asylums of New York State have a definite alcoholic history. In this condition lies one of the greatest opportunities ever offered to the medical profession. Even now a proper classification of the patients thus immured, and their appropriate treatment, would in many instances result in the return to the normal of those affected; proper classification and treatment at the time when the symptoms of mental disorder first appeared would have resulted in the salvation of innumerable cases. As a matter of fact, I earnestly believe that if this course was followed, the number of supposedly permanent cases of insanity arising

from alcoholic and drug addictions might be decreased by seventy-five per cent.

Certain general rules may be laid down. There are no circumstances in which it is advisable for a physician in private practice to attempt to handle a case of chronic alcoholism in the patient's own environment. Efforts to do this are constantly made, with the result that many needlessly die from lack of alcohol, while an even more tragic result is the unnecessary entrance, first into the psychopathic wards of our hospitals and thence into our asylums for the insane, of innumerable cases which needed intelligent treatment only for alcoholism or drug addiction. If this treatment is neglected, the incarceration of these unfortunates in asylums becomes necessary, for without question their insanity is real enough.

UNSCIENTIFIC METHODS IN THE TREATMENT OF ALCOHOLISM

During the summer of 1913 I visited a large hospital in Edinburgh and discussed alcoholism and its treatment with the visiting physician.

"We do not have many alcoholics here," said he.

[&]quot;Why?" I inquired.

"All our hospital work is supported by private subscription," he answered.

"Then there is no place whatever in Scotland for the care of the acute alcoholic case?"

"No. If an intoxicated person is locked up by the police and develops delirium, he is sent here, and we do what we can for him by the old methods."

"You offer no definite medical help along special lines?"

"No; we have none to offer."

He showed me two cases in the general ward; one man in a strait-jacket was in the midst of delirium tremens, his face terribly suffused. He was in a pitiable state, and nothing was being done for him.

"What course shall we follow?" the physician inquired.

"Let me see his chart," I requested. After I examined it, it became immediately apparent that the patient's condition was due to lack of his usual drug. It was his third day in the ward.

"Nothing but sleep will save him," I said, and suggested medication which was administered.

In three or four minutes the patient was re-

laxed and taken out of the strait-jacket. I made certain suggestions regarding general stimulation for the bowels and the kidneys, and diet. On the next day I found the patient improved after twelve or fifteen hours of sleep, and wholly free from delirium. His case had now become simply a matter of recuperation.

Another case had lived through several days of delirium tremens, which had been followed by a "wet brain"; the visiting physician considered this patient a fit subject for the psychopathic ward. I asked the patient questions about himself. He was sure that he had been out the night before and pointed out one of the internes as his companion during the hours of dissipation. His case was regarded at the hospital as almost certain to end in an asylum. I suggested treatment and within two days the man's mind had entirely cleared up.

These instances of successful and prompt relief occasioned considerable surprise among the hospital physicians, who frankly admitted that they knew nothing to do except to keep the patients there under restraint, and, if necessary, feed them according to existing rules, to keep their bowels open and their bladders free, and hope for the best.

This was an institution which is supposed to represent the best medical learning in the United Kingdom. I found similar conditions existing in the great hospitals of London, Paris, and Berlin, so that the Scotch institution is not an exception to the general European rule. Everywhere I was frankly informed that the medical staff knew of nothing to be done in alcoholic cases beyond deprivation and penalization.

Nor have we been more scientifically progressive in the United States. We are following virtually the same unenlightened methods, and it has even been suggested that chronic alcoholism be added to the conditions which in the minds of some sociological thinkers justify sterilization. How important our shortcoming is may be strikingly illustrated by the statement that alcoholic patients comprise one third of all the cases admitted to Bellevue Hospital in New York.

THE DIFFICULTY OF TREATMENT IN SOME ALCOHOLIC CASES

The alcoholic differs notably from the person addicted to drugs. A drug-taker, deprived of his drug, will experience in the early stages only acute discomfort and a natural longing for the

drug of which he has been deprived. His unfavorable symptoms can always be relieved by the administration of the drug. The chronic alcoholic, however, deprived of the stimulant, often drifts into a delirium which cannot be relieved by the administration of his accustomed tipple. No more terrible spectacle can be imagined by the human mind than that of an acute case of delirium tremens; no patient needs more careful watching in order that unfavorable developments may be avoided; once delirium sets in, no type of case is medically so difficult to handle. The man who for long periods has been saturated with alcohol, and who is suddenly deprived of it, is, I think, more to be pitied than almost any one I know; yet relatives, friends, and physicians frequently follow exactly this course, and think that by so doing they are rendering the patient a kindly service.

CAUSES OF INSANITY

In mentioning the causes of insanity, it is, however, impossible to permit the impression to be recorded that alcohol is the only offender. My statement of the part which alcohol plays in supplying the population of our mad-houses has

never been denied; but it is also true that the use of headache powders and other preparations commonly sold at our drug stores and as yet slightly or not at all restricted by law, and the use of coffee, tea, and tobacco in unrestricted quantity, also contribute their quota to the insane. A letter from the superintendent of a certain state asylum tells me that he has seen many improvements, sometimes even amounting to cures, result from ten days of fasting. That fasting really was a process of unpoisoning. In such a case the symptoms of insanity may be attributed to auto-intoxication, coming from any one of many causes, of which alcohol, tobacco, or even food improperly selected or unreasonably eaten may be one. The physician can have no means of learning just what method to pursue in any case of auto-intoxication until the patient has been unpoisoned. If any one of the great general hospitals would secure careful histories of one hundred of its patients and apply the proper methods to those who are found to have been poisoned by their habits, surprising results would be achieved. It is specially true that no intelligent mental diagnosis can be made of any patient who has had an unfavorable drug, alcoholic, or even tobacco, tea, or coffee history until

he has been freed from the effects of these drugs or stimulants. The first thing that a physician must do when confronted by a case of alcoholic or drug addiction is to learn whether it is acute or chronic. If the case is chronic, the patient must not be suddenly deprived of his stimulants.

CHAPTER VI

HELP FOR THE HARD DRINKER

THE people of the world in general, and THE people of the work is especially the people of the United States, are asking more questions about the cost of alcohol—not its cost in money, but its cost in men. These are questions which statistics cannot answer, which, indeed, can never be definitely answered; but we know enough to be assured that if answers could be given, they would be appalling. With increasing unanimity the thinkers of the whole world are saying that in alcohol is found the greatest of humanity's curses. It does no good whatever; it does incalculable harm. A dozen substitutes may be found for it in every useful purpose which it serves in medicine, mechanics, and the arts; its food value, of which much has recently been said, is not needed; and it has worked greater havoc in the aggregate than all the plagues. If not another drop of it should ever be distilled, the world would be the gainer, not the loser,

through the circumstance. Yet the use of alcobol as a beverage is continually increasing. The number of its victims sums up a growing total. Sentimentalists have failed to cope with it, and the law has failed to cope with it. In combating it, the world must now find some method more effective than any it has yet employed.

When we consider excessive drinkers as a class, we find that a large number of alcoholics are born with tendencies which make alcohol their natural and almost inevitable recourse. As a rule they are naturally highly nervous, or, through some systemic defect, crave abnormally the excitation which alcohol confers. For these reasons, granting favorable opportunity and no great counterbalancing check, they are foredoomed to drink to excess. Some are predisposed to alcoholism by an unstable nervous organism bequeathed to them by intemperate parents or other ancestors; others are drinkers because they do not get enough to eat, or fail, for other reasons than poverty, to be sufficiently nourished; and others, possessing just the favorable type of physique, become alcoholics through worry or grief. All these kinds of people are victims of a habit which, properly speaking, they did not initiate, and of which, therefore, censure must be very largely tempered. Yet they are generally treated as though they had perversely brought about their own disease, a course not more reasonable than the punishment of people for developing nephritis or cancer.

The demand for a more effective as well as a more logical treatment of alcoholism has even greater urgency than comes out of this injustice. Much of our best material falls victim to this disease. By general admission the alcoholic often possesses many qualities of mind and temperament which the world admires and pronounces of the utmost value when rightly developed. Even the careless weakling who drinks to excess is proverbially likely to be generous, magnanimous, warmly impulsive, even quixotic. The finest sensibilities, the most delicate perceptions, and the most enthusiastic temperaments —from all of which qualities great constructive results may be expected—are notably the most exposed to alcoholism. A far greater number of its victims than the offhand moralist is inclined to concede have admirable sturdiness of will and dogged persistence. With less, perhaps, they would not have become excessive

drinkers. They are alcoholics because with the help of stimulants they have habitually forced themselves to overwork, to bear burdens of responsibility beyond their normal strength, or to overcome physical obstacles, like poor health, eye-strain, and insufficient nourishment. The man who drinks is not necessarily depraved; but under the influence of stimulant he is very likely to drift into associations and environments which will lower his standards until he becomes irresponsible, unadmirable, or even criminal.

ARE ALCOHOLICS GETTING A FAIR CHANCE?

It is perhaps not going too far to say that most alcoholics have not been given a fair chance by their bodies, their temperaments, or the actual conditions of their lives. The question is, Are they getting a fair chance from society—society whose experience has demonstrated that it must in some way protect itself from them?

At present the only public recognition of the alcoholic is manifested through some form of penalization. He loses his employment, he is excluded from respectable society, in extreme cases he is taken into court and subjected to

reprimand, fine, or imprisonment. Nothing is done to bring about his reform except as the moral weight of the non-remedial punishment may arouse him to his peril and set his own will at work. Instances where this occurs are rare, because the crisis always comes when, through the influence which alcohol has wrought upon him, his brain has been befogged and his will weakened. Society does virtually nothing to awaken that will or to assist its operation. man whose drinking has so disarranged him physically or mentally that he is obviously ill is, it is true, taken to the alcoholic ward of some hospital, but even there no effort is made to treat the definite disease of alcoholism. For example, Bellevue and Kings County hospitals, where New York's two "alcoholic wards" exist, are institutions devoted specially to the treatment of emergency cases. As a matter of course, the alcoholics taken to them are merely "sobered up." As soon as they are sobered and have achieved sufficient steadiness of nerve to make their discharge possible, they are turned out again into the liquor-ridden city, with their craving for the alcohol which has just mastered them no weaker, with their resolution to resist its urging no whit stronger, than they were before the crisis in their alcoholic history engulfed them. There is as yet no public institution in New York City where a man, either as a paying or as a charity patient, may go for medical treatment designed to alleviate the craving for liquor; no organized charity makes provision for the medical treatment of the alcoholic. Only three States in the Union attempt to provide more competently than New York State does for this class of unfortunates. The provision they make progressively treats men convicted of drunkenness in the courts with surveillance, threat, colonization, and finally perpetual exclusion from society. Massachusetts has a colony for inebriates, New York is developing one, and Iowa has had one for several years.

This, then, is at present the treatment accorded by the public to the victims of this serious disease. There are no clinics devoted to the study of alcoholism, although it is the ailment of probably one third of the sick people in the world to-day. Those who feel disposed to question this statement will be convinced that it is reasonable if they but make a count of the private sanatoriums dealing exclusively with alcoholics in and near New York, and, indeed,

dotting and surrounding all our large cities. Connecticut, New Jersey, and Illinois will show a startling number. And it must also be remembered that many of the cases of disease other than inebriety treated in all public hospitals have histories more or less alcoholic, and that the insane asylums are crowded with those gone mad through drink. It is the demand of common sense, not of sentiment alone, that this situation should be altered.

Provision never has been made really to help even the man who, having lost control, is anxious to regain it. Inquire of the United Charities in New York and of similar organizations in other cities, and you will learn that they are doing most intelligent work in the treatment of tuberculosis, but that alcoholism is getting only condemnation and punishment, not curative methods; yet there probably are forty alcoholics to every consumptive. Neglect is almost universal, and where that charge cannot be brought, there the errors are incredible and continual. Many are charitable toward the drunkard, giving him their dimes when he begs for them, and thus promoting his inebriety; but society as a whole ignores him until he forces its attention through his helplessness or often through some sin, which might be more rightly charged to alcohol rather than to any natural criminal tendency in the man's nature.

ALCOHOLICS SHOULD BE TREATED AS INVALIDS

The physician, as things are, can do little with the sufferer from any ailment if his system at the time is impregnated with alcohol, for the alcohol may very likely prove an antidote to the medicines, or, if it does not, may prevent the patient from taking them. An alcoholic does not keep engagements; he cannot be expected to take doses as prescribed by his physician. An alcoholic who is also ill of something else is doubly ill, but he usually gets treatment only for his secondary illness. No man who has lost control through stimulants is well, and until he has been definitely treated, he cannot be expected to act normally. The world does not yet know how to deal with him. Sequestration as it is usually practised—trips round Cape Horn, weeks spent in the woods where liquor cannot be obtained—will never do it. Not only must the physical yearning be eliminated, but the mental willingness to drink must be destroyed before reform can be accomplished. It is at this point that the sentimentalists are wont to

fail. A promise made by one in whom the craving for the stimulant exists cannot properly be considered binding, for such a one is not responsible for what he promises. If body proves stronger than the mind in such a battle, he is merely an unfortunate, not really a liar or a weakling. The world's loss through alcohol has been incalculable. No community ever existed which could afford to relinquish the services of all its citizens who drink to excess or even of those who frequently get drunk. Yet society has continually maintained that when encountering the alcoholic it has crime, not disease, to deal with. Hence the crudely ineffective idea of penalization as a preventive.

In general the nearest approach which has been made toward physiological treatment beyond, of course, the mere "sobering up" in an occasional hospital of patients made delirious by drink-has not been through medicine, but regimen, and this regimen has invariably included sudden enforced abstinence. This remedy is worse than the disease. It rarely helps and sometimes kills. I have seen many men who had been pronounced insane after they had been deprived of alcoholic beverages, without proper treatment, but whose minds be-

came perfectly clear as the result of the definite medical care their cases really required. Numbers of far from hopeless alcoholics are yearly being sent to our insane asylums, where there is little chance of their recovery, I think. Furthermore, by merely depriving an alcoholic of alcohol without eliminating his desire for it, we are likely to force him into something worse. Thus the attempt to enforce abstinence upon the man who wants to drink is not only ineffective, but destructive. In making this statement I do not wish to be understood as being opposed to the prohibition of the sale of alcoholic beverages; indeed, I should favor the most drastic restrictions prohibiting the sale of alcohol. If there was never another ounce of alcohol manufactured, the world would be none the loser either medicinally or commercially. My reason for making this statement is that prohibition of the sale of alcoholic beverages has been largely defeated because there have not been the proper safeguards thrown about the manufacture and sale of drug-store concoctions that can be had in any quantity as substitutes for alcoholic stimulants; and I think the most drastic legislation that could possibly be created on this subject should be enacted and enforced against the druggists selling over their counters such con-

The late Dr. Ashbel P. Grinnell, for seventeen years dean of the Vermont Medical College, studied this phase of the subject, gathering interesting statistics.

After Vermont's adoption of prohibitory legislation, he sent out to wholesale and retail drug stores, general stores, and groceries that carried drugs as a part of their stock a letter in which were inclosed blanks calling for specific information concerning the sale of habit-forming drugs. Such was his personal standing in the State that he received responses from all but two or three of those whom he addressed. and these indicated that such sales had swelled rapidly until they indicated a daily consumption equal to one and one half grains of opium or its alkaloids for every man, woman, and child in the State. This vast increase in the use of dangerous drugs he attributed solely to the prohibition of the sale of liquor. Thus it must be argued that the attempt to enforce abstinence upon the man who wants to drink is not only ineffective, but destructive. Society may thus save itself from a few drunkards, but is likely to get lunatics or "drug-fiends" in their places.

REFORM CANNOT BE ATTAINED BY PUNISHMENT

At the foundation of the present treatment of the alcoholic is usually the idea that threatening with punishment can be effective. Actual experience and the slightest examination prove this to be preposterous. Many a man who drinks when he knows he should not, does so because he cannot control himself, and he who has lost his self-control is obviously irresponsible. A threat, or the remembrance of a threat, cannot restrain him. A man who had committed a crime while drunk, but whose whole career had otherwise been reputable, was sentenced to life imprisonment. After he had served six years his friends presented so strong a case to the governor that he was pardoned, but with the warning that if he took one drink he might be returned to prison to complete his sentence. An excellent illustration of the slight influence of fear upon the alcoholic is furnished by the fact that within a very short time he was arrested for public drunkenness. Punishment breeds rebellion, and when you make a man rebellious you are most unlikely to reform him. Punishment has never vet cured a disease. inflamed brain not only carries grudges, but is almost sure to intensify them. If a man is discharged from his employment or arrested at a time when he is in the abnormal alcoholic state. the effect on him cannot be reformatory; it must be to arouse his resentment, not his repentance. The employer who discharges a good man from his position because of drunkenness not only fails to deal intelligently with the man or with the subject, but may very likely be committing a crime against society by robbing it of a useful citizen and at the same time forcing a useless one upon it. A man taken to court for drunkenness should with great care be properly classified. It should be determined whether he is an habitual drunkard, an occasional drunkard, or an accidental drunkard. There may be hope for the occasional drunkard, there is invariably hope for the accidental drunkard. If one of these is found to have employment at the time of his arrest, great care should be exercised not to let the fact that he has been arrested prejudice his employer against him, and as far as possible he should be spared humiliation. Nothing will more quickly unfit a man for anything worth while than humiliation. To punish such a man with a prison term will help no one.

Neither should be sent back to his liberty without some recognition of the fact that he has been drunk and irresponsible. Any police officer, and more especially any police-court reporter, will testify that almost every man who, having been arrested for drunkenness, is discharged from custody without penalty, for one reason or another, social position, political importance, or previous good character record, will find a saloon within two blocks of the court and take a drink on the way home. He will probably not get drunk,—the impression made by his arrest will remain too strong to permit that,—but he will take a drink. And that and other drinks will help time drive from his mind the memory of the arrest, the cell, the court. And what is true of him who has been arrested and discharged is also true of him who has been arrested and imprisoned. Punishment fails utterly to "reform" the alcoholic.

Nor is colonization more effective, except for the hopeless cases. It means segregation. A man once said to me: "I want to be helped, but not at the cost of compulsory association with others seeking help. I know that to be thrown into unavoidable contact with those worse than myself would hopelessly degrade me.

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I should not be willing to risk that, no matter how much good the treatment might do me." Colonization of the occasional alcoholic stamps him only a little less deeply than his stripes are sure to stamp the criminal who is sent to prison, and its effects upon him and his family are not more desirable than they would be if the process made exactly that of him. He is likely to be barred from employment after his discharge from the colony, and thus find it impossible to reëstablish himself. Moreover, during the period of sequestration it is difficult to devise a plan for the care of the wives and children of those sent into seclusion. At a time when nothing in the way of betterment can be expected of him unless he regains confidence in himself, such treatment does not strengthen, but cripples, a man's spirit. Surveillance after his return will work on his imagination, cowing him into morbidness, until that alone will first weaken his will and then break it down. great emphasis, therefore, cannot be placed upon the viciousness of colonization for any but the first of the three classes into which I have said that all men charged in court with drunkenness should be carefully separated. Colonization of the hopeless is advisable only because such men, before they have descended to that stage, have cost their friends and society all that it is advisable to spend on them. If the man who is worth while is to be saved, it must be without the application to him of the brand.

So much for the existing public methods of dealing with the alcoholic. The most usual private method is for a man's family or friends, when he has lost control, to send him to some place where he can "get a grip on himself." But he often does not receive in such a place, any more than in the hospital or prison, that specialized treatment which can make that regained grip effective. General treatment, accompanied by a gradual withdrawal of stimulant, will restore his bodily strength, with the result, in nine cases out of ten, that when he emerges from the seclusion he is able to drink more than he was before he was sequestered, and will be sure to come to grief more quickly. In most cases his craving and need for stimulant are in no degree decreased, and in consequence he will frequently relapse while going to the railway station on the homeward journey. An even graver danger is that, while still in full possession of the alcoholic habit, he will in addition contract the hypodermic habit, and any drug habit developed in the alcoholic is the most difficult of cases to deal with successfully. If he does relapse, his friends will almost surely hold him blameworthy and impatiently abandon him as hopeless, believing everything to have been done which can be done. In reality nothing at all useful has been done to help him. He is a sick man, and no attack whatever has been made on his disease.

COMPLETE MENTAL CHANGE MUST PRECEDE REFORM

This brings us to the kernel of the matter. No man who has become addicted to the use of alcohol can possibly abandon it unless he has first undergone a complete mental change, and in ninety-nine cases out of a hundred this alteration of the mental state will not come until he has experienced a physical revolution. The reason for this is simple. Excessive use of alcohol really deteriorates body and brain tissue, and tissue degeneration transforms for the worse the entire physical and mental make-up of a man. The confirmed alcoholic is in the state which, save in rare instances, nothing short of specialized medical treatment can correct. Mere general building up of bodily tone

is as ineffective with alcoholics as is enforced deprivation or punishment.

I emphasize this point particularly because many men are afraid to take any treatment for alcoholism lest through it they lose their standing with themselves or with their neighbors. Self-respect must be protected at every stage of the struggle as the patient's only hope. My purpose here is to show that the only chance of reforming most alcoholics lies in giving them opportunity through this physiological change to reëstablish confidence in themselves.

In setting about the business of treating an alcoholic, the first step is to realize that he is in an abnormal mental state. To moralize or to appeal in the name of sentiment to a warped and twisted mind is, I believe, sheer waste of time. To the man who has lost control, it must be first restored before he can be put to thinking. You cannot expect the distorted alcoholic brain to be honest with you or with itself.

I cannot emphasize too strongly the harm that may come out of simply depriving the chronic alcoholic of his stimulant. I know that there are many relatives and friends and even physicians who, out of pure desperation, feel that they have accomplished much when they are able

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to put a man where he is unable to get his drink, irrespective of the amount which he has been accustomed to take. I consider the chronic alcoholic one of the most important cases in medicine to deal with successfully. Strange as it may seem to the layman,—and it is just as strange to the physician,—to such a case there is absolutely no other form of artificial stimulants that will take the place of alcohol, and when a patient is deprived of his accustomed stimulant, within twenty-four hours he begins to drift into delirium tremens, which means that the patient is a very sick man, and unless he is properly treated, will, if he lives through the active period of delirium, drift into a "wet brain," or, in other words, alcoholic insanity; and even if the patient survives the latter illness, a large percentage of such cases prove in the end to be hopelessly insane, and about eighty per cent. of the delirium tremens cases that do not get proper medical help die. It is a very serious matter dealing with the chronic alcoholic. Something definite must be done for such a case; deprivation is impossible; simple reduction is sometimes a failure; nothing short of definite medical, hospital work will unpoison this sick man and avoid the complications of delirium, "wet brain," or possible hopeless insanity.

The second step is to give the patient that definite medical treatment which will correct his physical condition. Once this change has been effected, you have a man whose system is no longer crying out for liquor, with every nerve a-quiver for it, every tissue thirsting for it. There have been reforms from alcoholism which were not preceded by this physiological change, but they have been rare.

The physiological metamorphosis may be accomplished from without, by means of treatment, without assistance from the patient other than mere acquiescence. The mental change can be assisted from without; it cannot be accomplished or maintained by any one except the patient. Despite himself a man may be successfully treated for other ailments, but not for alcoholism. By an intelligent subsequent attitude friends or physicians may help to restore self-confidence, but that is all they can do.

After the desire for it has once been eliminated, the patient cannot afford to take any alcohol whatever, and after a proper change of mental attitude he will not wish to. From alcohol he must abstain altogether, even in ill-

ness. Let no recovered alcoholic risk relapse because alcohol seems to his physician to be desirable as a medicine. Indeed, the most extreme care should be exercised to avoid medicines containing alcohol even in small percentages, and this will bar most of the proprietary remedies. When he is hungry, let the recovered alcoholic eat; when he is weary, let him be sure to rest; when he feels ill, let him be sure to consult without delay a competent physician. None of these conditions indicates a necessity for alcohol.

Thus the man who is not hopeless may be saved. Society owes every alcoholic a fair opportunity to reform; it may be questioned if it owes him repeated opportunities. Many alcoholics never have been and probably never could be useful citizens. Waste of money and emotion on them is lamentable to contemplate; the sums at present thus hopelessly thrown away would aggregate enough really to restore every alcoholic actually curable. Sentimentalists do not like to admit the limitations of useful help, but those limitations do exist, and we should reckon with them. If we do, the man really curable will have all the better chance.

A TEST OF THE WORTHY

It is possible to discriminate between the curable and the incurable by the simplest of expedients. Usually the question, What is this man willing to do in return for help? will, with its answer, also supply the answer to the inquiry as to his future. No man of sufficient mental fiber to make helping him of any actual value is willing to accept charity. Even if he finds himself at the moment unable to repay the debt involved, he will be anxious to make it a future obligation. My fifteen years of experience have proved to me that the sense of personal obligation is of great moment in this matter. Even when it becomes necessary for a relative, employer, or friend to assist a patient by the payment of his bills, it should be regarded a part of the treatment to consider this a loan, which must be repaid, and not a gift. It follows, sadly enough, that the most hopeless alcoholic is the rich young man to whom financial obligations incurred for treatment mean nothing whatsoever, and to whom responsible employment is unknown. Indeed, it seems well-nigh impossible to reform the vagrant rich. The man who thinks that giving up his alcohol is primarily a privation, although he may admit the definite necessity of this privation, is not likely to reform permanently; but there is hope for that one who declares without apology that drinking is a bad business and that he wishes to be helped to stop it. I cannot say with too great emphasis that self-respecting pride is the main hope of the alcoholic.

It must not be overlooked, however, that it is the pride of the curable alcoholic which makes him difficult to reach. To try to help such a man when it is too late is a pitiably usual experience, for not until it is too late does the pride of such a man allow him to apply for help. The man who says, "I will not drink today," and finds himself compelled to; who promises himself, but cannot keep his promise, is the man who most deserves help, and is most likely to yield some sort of good return on an investment made in him. Indeed, it is the rare alcoholic, curable or incurable, who of his own initiative submits himself to treatment. Friends must assist; but while the importance of such friendly service cannot be overestimated, it must be of the right kind or it will be worse than useless. Friends of alcoholics too often either sentimentalize or bully when they go about the task of helping, or they allow too little time for the accomplishment of the reform. Successful business men are specially likely to act childishly when dealing with the mighty problem of assisting alcoholics to their feet. They are likely to affirm that there is no excuse for any man who yields to drink. If they have given help before, they are prone to call attention to the fact that their beneficiary has not recompensed their kindness by reforming, and declare, for instance, that they will pay his board another week, but that will be the end of their endeavor. This spirit—and it is the usual spirit—can accomplish nothing; and the money spent in this and other ill-considered and halfhearted efforts to save men has not decreased. but has increased, the dissipation it has sought to stop. Even relatives and intimate friends are likely to become weary of a case which shipment to some private institution, deportation to a ranch, or embarkation on a sailing-vessel for a long voyage has failed permanently to help.

Such treatment works no reforms, or almost none. Until the cause of drinking is removed, travel from one place to another in an effort to obtain reform by breaking up old associations will be of no avail, but will, instead, repeat the experience of the old woman in the fairy-tale who was bothered by a goblin. When she uprooted herself from her old home and sought another, the goblin, hidden in a churn, went with her. It was the old woman, not the cottage, he was haunting; it is the man, not his environment, in which the alcoholic habit finds its stronghold. When a patient by intelligent treatment has been put into a receptive state of mind, he should be told to look up his old associates and to them declare himself upon the liquor question. If they are friends, they will congratulate him; if they are not, he will have gained by making certain of it. And there is very little danger that, after he has seen them, he will wish again to make intimates of them; that after, in his sober senses, he has examined the surroundings which they frequent, he will be willing to return to them. Being himself normal, he will wish for normal men as friends; being far more fastidious than he was when he was alcoholic, the old haunts will fill him with This declaration of himself the man must himself make. Good friends may help him otherwise, and chiefly by refraining from

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the slightest thing which may by any chance tend to decrease his self-respect and his confidence in his own power to stay reclaimed. What a man needs is a new mind on the subject.

CHAPTER VII

CLASSIFICATION OF ALCOHOLICS

A LCOHOLICS are more easily classified than drug-takers. With few exceptions, alcohol-users have their beginnings in social drinking. Not a few women and boys have had their first taste of alcohol, and may even have acquired a definite alcoholic habit, through the small quantities administered as stimulants by physicians; but in a general way it is as easy and just to absolve the physician from responsibility in the matter of alcoholism as it is easy and just to put a heavy responsibility upon him in the case of the use of drugs.

THE DEMAND FOR STIMULANTS

In these days all mankind searches for exhilaration. The instinctive demand for it is an inevitable result of the artificial social system which we have built up. We work beyond our strength, and naturally feel the need of stimulants; we play beyond our strength, and as

naturally need whips for our vitiated energies. The greatest social disaster of all the ages occurred when first alcoholic stimulation, which is only one step in advance of alcoholic intoxication and narcotization, found its place as an adjunct of good-fellowship. All humanity turns in one way or another to artificial stimulants, and while alcohol and narcotics are the worst among these, we cannot slur the fact that many who would shun these agents as they would a pestilence, turn freely to milder, but not altogether harmless, stimulants, such as tea, coffee, and tobacco.

I do not purpose to go into a long dissertation upon the chemical peculiarities of alcohol; I do not purpose to discuss the value or peril of alcohol as food; there are plenty of published chapters telling exactly what alcohol is. I feel that it is my mission to do none of these things, but to endeavor to reveal to the student the most effective way of dealing with a patient who has drifted into a definite alcoholic addiction.

THE MAN WHO CANNOT BE SAVED

It seems impossible to arouse any enthusiasm or sympathy for the human derelict whose natural weakness is inevitably such that one taste of alcohol means a gallon, and final wreck and ruin. The human cipher, plus alcohol or minus alcohol, it matters not which, means nothing. It may be true that alcohol subtracted from nothing leaves nothing, but it is certain that alcohol added to nothing may mean a peril to society and a serious charge upon it.

A man who has achieved nothing up to the point where he has become addicted to excessive alcoholism will rarely repay the trouble involved in an effort to preserve him from his folly, although of course his preservation from it might be of general social service as a means of saving the public money that otherwise might be expended in the reparation of the work of his destructive tendencies, besides the public expense involved in police, court, and prison economy that prevents him from the opportunity of indulgence. But thousands of decent men annually yield to alcohol, and are wrecked by it. The decent and potentially valuable citizen who through overwork, worry, sickness, sorrow, or even through a mistaken conception of social amenities or duties, drifts into excessive alcoholism is a victim of our imperfect social system, and repays remedial effort. Furthermore, such a man is invariably savable if he himself applies for salvation, assists with his own will in its application to his case, and pays his own money for the cure.

The proportion of the cases that can be saved among the general run of alcoholics who are sufficiently prosperous or have sufficiently prosperous friends to make them likely to come under my direct observation amounts to about one quarter of the whole. It will be observed that this claim for alcoholics is far below the claim which I have made for drug-users.

Where it is found that a case of excessive alcoholism has grown out of a lack of a normal sense of responsibility, where excessive alcoholism has reached the point at which deterioration of the moral nature has set in, or where social and financial entanglements already have resulted, a problem is presented which is complicated and even very doubtful. In such a case far more than definite medical treatment must be resorted to before a complete restoration of the unfortunate to social usefulness can be hoped for. The naturally irresponsible person or the person already led into irresponsibility by alcoholism may be regarded as an almost hopeless proposition. This is peculiarly the case where no financial obligation can be imposed upon the patient as a part of the treatment. The very poor for whose treatment some one else must pay, and the very rich to whom the sum paid for treatment is a matter of no moment, are almost equally hopeless. My long experience has taught me that the man who does not feel a financial responsibility for that which is done for him is usually the least promising of all the cases brought to me. I have found it necessary to regard as a definite part of my treatment the imposition of a monetary obligation.

If, for example, the employee of a person or a corporation is sent to me for relief from alcoholic tendencies by his employer or employers, I invariably refuse to accept the case unless it is agreed that the sum paid for the patient's treatment shall be held against him as an obligation to be repaid as soon as possible to those who have advanced it. Even the man who is curable will fail in a psychological realization of the misfortune into which he has actually fallen through alcoholic indulgence unless he himself must pay the fiddler. In the case of a working-man who is brought to me for treatment by his employers, I make a minimum charge as a rule, but only on the condition that

with all due speed it is deducted from his payenvelop. In the case of men of a higher order, as professional employees, heads of departments, etc., I insist in a general way upon following the same line of procedure. I cannot too strongly emphasize my absolute conviction that it is invariably a waste of money and time for an employer or an employing company to attempt to help alcoholics by means of free medical treatments. No good will come from this in the long run, as it never will prove to be worth while. Thus we may classify very rich, utterly poor, and irresponsible inebriates as among the hopeless. From every moral, social, and economic point of view the hopeless inebriate is a liability to the world at large. Throw him in the sieve of respectability, and soon or late he will always prove small enough to slip through the meshes.

COLONIZATION OF ALCOHOLICS

Among such cases will be found fit subjects for colonization, and these are the only ones who should be treated in this way. No greater social mistake is possible than the colonization and segregation, either in sanatoriums or inebri-

ate farms, of other than utterly hopeless alcoholic cases. The next greatest mistake undoubtedly is society's failure to segregate those who are utterly beyond the pale of hope. These men and women will be less of a burden to their friends and the community after segregation; their segregated existence will not constitute a threat against society of the present and future generations. It is my opinion that these people, men and women, rich and poor, should be sterilized and put at work. It is possible that this plan, if properly carried out, might develop some institutional effort worth while. That at present practised means a waste of time and money.

It should be borne in mind that deprivation never yet removed the underlying cause of the desire for alcohol, no matter over how long a period this deprivation may have extended, nor has it ever removed the desire itself. These things can be brought about only by the elimination of the poison from the victim's system.

All alcoholics, no matter whether they are preferred risks or hopeless cases, whether they are to be returned to society or isolated and sterilized, should be unpoisoned.

SUCCESS OF THE SPECIFIC TREATMENT

The first exhaustive test of this treatment for alcoholism was made at Bellevue Hospital, and its results were announced in a pamphlet published by Dr. Alexander Lambert. The hospital in which the work was carried on was without ideal facilities; overcrowded wards and an insufficiency of nurses were among the many handicaps. That the results were more hopeful than anything theretofore accomplished is indicated by the following extracts from articles by Dr. Lambert:

RESULTS

I am often asked as to the success of this treatment and the percentage of patients who remain free from their addiction. This varies enormously with the individual patients and one can only judge from one's experience. My personal experience is that 11 per cent. of the morphinists and 12 per cent. of the alcoholists return for treatment. Doubling this percentage it still gives us 75 per cent. as remaining free from addiction. Of these a very high percentage are known to have stayed free.

SCOPE OF THE TREATMENT

This treatment is not offered as a cure of morphinism or as a cure of delirium tremens or chronic alcoholism, as I said in the first article. It will, however, obliterate the terrible craving that these patients suffer when, unaided, they endeavor to get off their drugs or are made to go through the slow withdrawal without some medication to ease them. Compared with the old methods of either slow withdrawal or rapid withdrawal, it is infinitely superior. Deprivation of a drug is in no way equivalent to elimination of that drug from the body. Deprivation causes suffering; elimination relieves it. But neither this combination of drugs nor any other combination known to man can prevent persons, after they are free from their addiction-be it alcohol or morphin-from going out and repoisoning themselves by taking again the drug which has poisoned them and led them on to their habitual intoxication.

There are many more morphinists who have unconsciously fallen under the spell of the habit through no fault of their own, than can be said of alcoholists.

To any one who has ever tried to break off a patient by the old withdrawal methods when they were taking goodly amounts of the drug, and has struggled to keep them free from it after they have ceased taking it, the difference in the picture when undergoing the treatment by this new method is most striking.

With this treatment most patients do not suffer more than a bearable amount of discomfort of hot flashes, slight pains, and the discomfort of their cathartics. When properly administered, this is the full extent of suffering with the majority of patients. Some do not go as far as this, a few suffer more. But

when improperly administered, they can suffer as much by this method as by any other.

No test more exacting than the one made at Bellevue Hospital could be devised. Most of the cases appearing for treatment in the wards of that institution are of the most advanced type, for the nature of the New York hospital system may be said in a general way to select for Bellevue the least hopeful patients coming from the least hopeful classes of society. If, therefore, anything approaching permanent relief was secured for as many as twenty out of every one hundred cases, an extraordinary efficiency was indicated.

Of course the intelligent reader will understand that no man with reason can claim for any treatment the power permanently to divorce from alcohol a man who does not wish to be divorced from it. To take a man whose system has reached that degree of craving for alcohol that he would sign away his right to salvation in exchange for a drink after a brief period of deprivation, if he could not otherwise obtain the alcohol, and to unpoison him so that he feels no necessity or even the slightest desire for a drink or for any stimulant, is to ac-

complish a great deal of good. It means that his nervous system has been restored to something nearly normal, and that he has been given a chance. The man who has not had this help from outside can do nothing for himself; but having been cleared of alcoholic poison, he is brought into a mental state wherein he finds it possible to estimate reasonably the harm which alcohol has done him. The patient is then in a mental state that enables his relatives and friends to deal with him without being forced to estimate and allow for alcoholic abnormalities in his processes of thought. He is in a physical state that, although it apparently may be worse than that in which the alcohol had placed him, is nevertheless one that will enable his physician to work with him intelligently.

Such an achievement seems a perfect piece of medical work of its kind. Properly carried out, my treatment will accomplish exactly this in every instance. It will accomplish it within five days and very likely within three days. I have never known it to require a period of more than seven.

When this treatment is properly provided for throughout the country, it will be found that neither large nor costly institutions will be necessary. The stay of every patient is so brief that in the average community a small institution containing only a few beds will be found sufficiently large to meet all local needs.

THE HABITUAL DRUNKARD IS NOT A CRIMINAL

Legislation restrictive of the sale and use of habit-forming drugs is in reality a dangerous experiment until other legislation that provides for the medical help of those who would thus be deprived has first been written upon our statutebooks. I am inclined to think that many of the failures which strew the paths of experimentalists in anti-alcohol movements have been due to a lack of similar foresight. The man who is penalized for drunkenness will usually get drunk again the moment he finds himself at liberty to do so; and this will not be due to any natural depravity upon his part, but, rather, to an almost inevitable result of the bodily craving that thrills his every fiber and for the relief of which nothing whatever has been provided. We shall never make any serious progress in dealing with the most serious evils of alcoholism until we waken to the folly of treating the hard and habitual drinker as a criminal, exacting from him penalties and inflicting upon him disgrace.

In every instance the passage of restrictive legislation should be accompanied by the passage of remedial legislation; for provision for the relief of suffering caused by prohibitory laws must be provided. The courts should carefully consider the facilities at the disposition of the communities in which they labor, and in imposing sentences they should be careful not to overtax them. It would be better for a community to keep a victim upon a steady diet of alcohol for weeks while he was waiting for a bed in a curative institution than to risk causing the man's death or insanity by depriving him of his alcohol until the means for relieving his system's acute demand for it were at hand. By following a similar plan, it will be found that the evil of habit-forming drugs can be exterminated in the United States. Whether alcoholism, which is a social vice, ever can be similarly exterminated by like methods I do not know; but I am convinced that an intelligent pursuit of such a policy would do more to accomplish the desired results than ever has been done by other means.

HOW SOCIETY TREATS THE VICTIM OF ALCOHOL

The care of the inebriate who already comes under the law, and who by his habits forces his way into the state and municipal hospitals, forms one of the great burdens upon society of the present day. It should be regarded as one of the most important problems of modern medicine.

No other class of the sick includes so great a number of individual cases. We find, for example, the almost incredible fact staring us in the face that more than one third of all the patients admitted to Bellevue Hospital in New York City are sent there by alcohol, while less than two per cent. are sent there by habit-forming drugs.

I am casting no reflection upon this or any other institution when I say that there and elsewhere little understanding is shown in dealing with these cases. As a matter of fact, no intelligence is anywhere shown in this matter. The policeman who finds a drunken man or woman on his beat arrests the unfortunate with as much wrath and probably as much brutality as he would show a burglar or a murderer; the committing magistrate before whom the victim

is taken treats him or her precisely as he would treat a criminal; in the various penal institutions to which this man or woman is committed the idea upon which their whole treatment is based is that of punishment.

It seems to me that the imperfections of this system might most easily be corrected by the committing magistrates. It is the largest problem which confronts these officials; therefore they might very well afford the time necessary to study it carefully. Concerted action by this group of the judiciary might accomplish worthy results almost immediately. As matters are at present organized, the committing magistrate may do any one of four things with an inebriate who has been brought before him: he can release him without penalty, he can put him on probation, he can fine him, he can imprison him. I have yet to discover any one capable of telling me why measures of this sort can possibly be expected to have a beneficial effect upon a person who through over-indulgence has set up in his system a demand for alcohol.

I have no wish to appear publicly as the critic of our petit judiciary, but no class of men is less informed upon this subject—the one subject upon which they should be best informed—

than the committing magistrates not only of the United States, but of every other country in the world. A year or two ago I made a somewhat comprehensive European tour, and studied carefully the methods of dealing with inebriety. Nowhere did I find the faintest indication of a tendency for real intelligence in regard to the matter. We insist upon special education for the professors of our colleges; yet the influence of a committing magistrate upon the human life that is brought under his direct sphere of influence may be greater even than that of a college professor or a college student, and of our committing magistrate we make no educational demand whatsoever, and have never established even a minimum standard of intelligent information for our petit bench. It is my belief that expert sociological knowledge should be required of every man considered for the important post of committing magistrate.

RESPONSIBILITY OF THE MAGISTRATE

The fact that in New York State a colony for inebriates has been established by law makes this special knowledge more necessary there than it was before. Wherever such institutions have been founded, and the courts may contribute to their population by commitment, an unintelligent magistrate finds it within his power not rarely, but every day, to do more harm during one session of his court than he is likely to find it within the scope of his intelligence to do good during the course of a year's sitting. I find it impossible to be otherwise than bitterly pessimistic in regard to the work our courts are doing with alcoholics.

Under the New York law, a man taken for the first time before a magistrate and charged with alcoholism must either be fined or told that if he again appears charged with that offense, he will be subject to commitment to the inebriate farm for a period of not less than three months. By this procedure not one thing has been accomplished toward the salvation of the man. is not committed, but is only threatened and ordered to report weekly or oftener to the probation officer or the court itself, the greatest of all damage has been done, since the man's pride has been depreciated. After definite medical treatment has been administered to an inebriate, the only other thing that can be done is to make an intelligent appeal to his pride. In this appeal is included at least one half the possibilities of his salvation. Nowhere save in a few

instances in New York City is the alcoholic case treated with medical intelligence, and nowhere in the world is the balance of the necessary treatment—the right appeal to pride—carried out with any degree of common sense.

I find one system of special horror in this treatment of inebriates—committing a man for three months, then for six months, and then for twelve. No more certain means could be devised to increase the harm done by alcohol to the community. Not only does this course fail to help the man in any measure whatsoever, but it increases the unspeakable harm which his misfortune must inflict upon his family. In most instances such a commitment not only means the man's separation from his means of livelihood for the period of its duration, but his discharge from it as the result of this utterly inefficient and legally inflicted disgrace.

The whole effort of society in dealing with the alcoholic should be to prevent those things which at present are the very ones which it accomplishes—mental depression, loss of pride, disgrace, and loss of social position. I am inclined to think that as the world grows older it will be more and more convinced of the inefficiency of punishment, and more and more aware of the necessity of reform through helpfulness.

It seems obvious that penalization, probationary influences, or colonization must be utterly useless in removing from a man's physical system the craving for alcohol. Therefore it is equally obvious that their only successful mission must be to remove the victim of drink from contact with society for the length of time during which his sentence is operative. The man who is in all probability incurable is not put permanently out of harm's way by these means, or placed where he can do no harm; the man who has good stuff in him but who has through chance used drugs to excess upon one or more occasion is offered by these methods nothing in the nature of a fair show toward regaining his usefulness.

I see the possibility of many serious results in New York's board of inebriety plan. These, I think, have their beginning principally in the fact that nothing along the line of classification has been devised or, as far as I know, has been even suggested. If its work were made efficient by means of the adoption of a plan of classification, this board really might become a great boon to society. Suppose that instead of penalizing the man who has been taken before it

for inebriety, the board, after intelligent and detailed investigation has shown that the man is probably curable, should provide for him the necessary definite medical treatment to relieve his system from the ill effects of alcohol, and then should bring him into contact with psychological and analytical minds capable of enforcing upon him a realization of the terrible meaning of alcoholism. Without having affected the man's pride it would send him back to his family and his task with a cool brain and a new point of view. Would not this be a vastly better way of dealing with him than those which are at present followed?

There is no reason why some small charge should not be enforced against such beneficiaries of an enlightened public intelligence who might be found able to meet it. This would accomplish two things: it would reduce the public expense of the system and it would add very greatly to the mental impression left upon the mind of the person for whose benefits the State was working. Furthermore, if a magistrate had once formed the habit of feeling personal interest in individual cases probably his first act after a man had appeared before him would be to send for the accused's employer and make

the truth of the situation clear to him. The mere fact that a man has once been intoxicated should not justify his discharge from employment in which at normal times he is useful and efficient. Both for his sake and for his employer's, efforts should be made toward reform; for it is not infrequently the case that the man who has lost control through drink is in normal conditions the best man in the office, factory, or workshop. That is one of the chief tragedies of the problem of alcohol.

There is no subject upon which society more sadly needs enlightenment. In this educational process it is probable that the magistrate will be the largest factor. He must realize that he is not society's instrument of vengeance, but society's instrument of helpfulness. It should be his aim not to punish, but to protect and preserve. He must realize that scientific knowledge of the problems which confront him is as necessary to his real efficiency as scientific knowledge is to the analytical chemist.

The heart of a conscientious magistrate should thrill with a special sympathy, should be aware of a great responsibility, whenever there appears for judgment in his court a man who for the first time has lost control of himself

through drink. To mar this man forever is an easy task; to make him may be difficult, but it is certainly not beyond the bounds of possibility.

The hard drinker who for the first time is haled into court as the consequence of intoxication never is willing to concede either to himself or to others that he needs help. His soul revolts before the mere thought that he has more than temporarily, even momentarily, lost control. He is likely to deny that he has developed a craving for alcohol, and emphatically and indignantly to assert that his drunkenness has been merely incidental to the social spirit, an accident, and in general a thing of no primary importance. The thought that without help there is even a possibility that he may drift from bad to worse is abhorrent to him, and is indignantly repudiated. He will cheerfully admit that many other men of his acquaintance have fallen victims to the effects of alcohol, but he will vehemently deny the possibility of a similar fall on his own part. The magistrate who thoroughly understands all the details of the alcoholic's psychology, and who is sufficiently adroit of mind and speech to take advantage of this understanding, giving the culprit who has been brought before him every benefit

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of a carefully and intelligently organized knowledge of alcoholism, could not fail to be one of the most useful of society's servants and safeguards.

The man or woman taken before a magistrate as the result of alcoholic over-indulgence offers a peculiarly perplexing problem. Society has placed itself in a highly inconsistent position as regards its relation to alcohol. It permits a man to pay it for the privilege to sell alcohol to any one who asks for it, the only restriction being that he may not sell it to a person who already has "had too much." This leaves the decision as to a customer's needs and capacity, as well as perils, to be rendered by the man behind the bar. Thus to an extent we intrust daily the destinies of an appreciable proportion of our public to a class of men who certainly have done little to earn general confidence. In nearly every State, if not in all, laws exist imposing penalties upon the dealer in alcohol who sells drink to a person who is already in a state of intoxication; but a careful study of the records of our courts would fail to reveal any large number of liquor dealers who have been charged with this offense, while it is obvious that most persons found upon the public streets

or elsewhere in a state of intoxication must have had alcohol served to them at a time when they had already "had enough." As a matter of fact, the intelligent mind cannot fail to realize that the man who has "had enough" invariably has had too much.

This is only one of many reflections which must occur to the inquiring mind occupying itself with this problem. We have made innumerable laws dealing with, and fondly supposed to control, the sale of alcoholic beverages, but as a matter of fact only one sort of law has ever been devised which possibly could control it, and that law provides for absolute prohibition.

THE NEED OF AN ORGANIZED EFFORT TO HELP -THE ALCOHOLIC

If the world wishes to be relieved in any measure from the human waste attributable to alcohol, the time must speedily arrive when municipalities will recognize it as their duty to provide definite medical help for every man who wishes to be freed from the craving for alcohol, and who cannot afford to pay for treatment. It must be recognized that it is society's duty to hold out this helping hand to every man who has

a job and is in danger of losing it through the trap which society itself has set for his feet by authorizing, and thereby encouraging, the sale of alcoholic intoxicants.

Notwithstanding the presence in our social fabric of innumerable charitable bodies, churches, religious societies, and other groups of people who mean well and work hard to aid the unfortunates, it is a fact that nowhere in the United States or, as far as I know, anywhere else is there a single organization which is effectually working along definite and intelligent lines for the preservation of the endangered man who is still curable.

No mother, wife, employer, or magistrate can effectively reason with a man whose brain is befogged by alcohol, for that man cannot reason with himself. Tears, threats of imprisonment, and loss of position do not have upon him their normal reaction. He is a sick man whose mental and physical condition is abnormal; it must be made normal before anything real can be done toward his assistance.

There is but one way out of the sad muddle in which alcohol has plunged certain branches of our judiciary. In every city must be established emergency hospital wards to which committing magistrates may send persons with excessive alcoholic or drug histories. Treatment in these emergency wards will be neither difficult nor costly.

Once this has been done, the patient may be returned to court, where his clarified brain will greatly assist the magistrate in deciding upon the proper course for his assistance and the protection of society.

The commitment of the alcoholic to an ordinary penal institution is a perilous expedient. The experiences which various authorities connected with the Department of Correction in the City of New York have had with drug and alcohol smugglers indicate a condition that exists more or less generally in penal institutions throughout the country. The drug-user or alcoholic who has been locked up in a prison is in no way relieved of his craving for the substance which is harming him, and his efforts to obtain it will be desperate. The class of men who surround him as prison guards is not of a high type. If he has money, they will get it from him if they can; and if he has friends outside, especially if they themselves be drug or liquor addicts, they will attempt to smuggle to him what he craves. Inasmuch as it is much easier to smuggle drugs into a prison than it is alcohol, many alcoholics have been changed in prison to drug-takers, and after this change the metamorphosis for the mere drunkard into an actual criminal has often occurred. The administration of a definite medical treatment should therefore be regarded as imperative in all cases of drug addiction, and in most cases of alcoholic addiction that appear in our prisons. In the cases of alcoholic addictions, imprisonment should end, in the case of first offenders, with the completion of the treatment and the restoration of the subject's mind to normal.

I cannot too strongly or too frequently reiterate the statement that there is no more desperate illness than chronic alcoholism.

Purification from the physical demand for alcohol at the place of commitment of men taken before the courts upon the charge of intoxication might save the public from a greater burden than any other available medical process. Drunkenness cannot rightfully be considered as a crime as long as society sanctions the sale of alcohol and profits by it; therefore the punishment of alcoholics as criminals is an intolerable injustice. That it is also an economic waste is as clearly apparent.

CHAPTER VIII

THE INJURIOUSNESS OF TOBACCO

THEN tobacco was first introduced into Europe the use of it was everywhere regarded as an injurious habit, and on this account for a while it made slow progress. It is no less injurious now than it ever was,—we have simply grown used to it,—and it was only when people became used to its injuriousness that the habit began to make great strides. We find nowadays that smokers as well as non-smokers are suspicious of any form of tobacco-taking to which they have not become used. Smokers who for the first time meet chewers or snuffers or those who "dip" tobacco, as in the South, are affected unpleasantly. Smokers keep on finding chewers disgusting, and smokers of pipes and cigars frequently object to the odor of cigarettes.

Nothing more strikingly illustrates how addicted people may become to a habit than the smoking and chewing of the traditional Southern gentleman of the old school, whom any other

personal uncleanliness would have horrified. Young men most fastidious about their apparel seem guite unaware that it is saturated with the smell of tobacco. The odor of a cigarette is probably as offensive to some of those who do not smoke as any other smell under heaven. Yet such is the power of habit that we tolerate all these things.

If we could begin all over again, we should find the same general objection to smoking that existed in Europe when the habit first began. Our chief need, then, is a new mind on the subject. How can we get it?

The circumstance of my giving up smoking eighteen years ago may have some slight significance in this connection. I was smoking hard, and began to have a vague feeling that it was hurting me. I had been playing whist at a late hour in my room at a hotel, and when I finally went to bed I could not sleep for a long while. I awoke with a bad taste and a parched mouth in a room heavy with stale smoke and unsightly with cigar-butts lying everywhere. Suddenly a disgust for the whole habit seized me, and I broke off at once and completely. After a week or so, when the first feeling of seediness and uneasiness and depression had worn away, I found my appetite and concentration and initiative increasing. You will observe that it was not until I began to regard smoking as harmful that I saw it was also filthy. I had a new mind on the subject.

I am trying to give my readers a new mind on the subject, and if they have not come to suspect the evil of smoking, they will naturally ask me to prove that it is harmful.

Let us begin at the bottom.

Does it do any one any physical good? Arguments in favor of tobacco for any physical reason are baseless. It does not aid digestion, preserve the teeth, or disinfect, and it is not a remedy for anything. The good it does-and no habit can become general, of course, unless it does apparent good—can only be mental. Let me admit at once that smoking confers mental satisfaction. It seems to give one companionship when one has none, something to do when one is bored, keeps one from feeling hungry when one is hungry, and blunts the edge of hardship and worry. This sums up the agreeable results of tobacco. There are one or two more specialized agreeable results which I exclude at this moment because they are only temporary. The results I mention—let me admit at onceare real, and both immediate and apparent. On the other hand, the injurious results, after one has become inured to tobacco poison, are both unapparent and delayed.

THE PHYSIOLOGICAL ACTION OF TOBACCO

As to the physiological and toxic effects of tobacco there is much difference of opinion. Everybody knows that the first chew or the first smoke is apt to create nausea; and that no matter how long a man has been smoking, a little lump of the tar which has collected in his pipe will sicken him. Nicotine is in itself highly toxic, but is very volatile and is absorbed only from the portion of the cigar or cigarette held in the mouth. The products of combustion of tobacco are chemical substances which are also toxic, and nausea naturally stops the smoker before symptoms of acute poisoning result. One must look, then, for symptoms of slow poisoning. The popular belief that tobacco stunts growth is supported by the fact that non-smokers observed for four years at Yale and Amherst increased more in weight, height, chestgirth, and lung capacity than smokers did in the same period.

Every athlete knows that it hurts the wind;

that is, injures the ability of the heart to respond quickly to extra work. It also affects the precision of eye and hand. A great billiard-player who does not smoke once assured me that he felt sure of winning when his opponent was a smoker. A tennis-player began to smoke at the age of twenty-one, and found that men whom he had before beaten with ease could now beat him. Sharp-shooters and riflemen know that their shooting is more accurate when they do not smoke. But you may say: "The athletes and billiard-players and the rest are experts. I am an average man, making average use of my faculties. Besides, I am not contending that excessive smoking is n't injurious, and I will even concede that the limit of excess varies with the man. But is it not true that harmful results of average smoking for the average man are rare?"

In answer, let me on my side admit that they are—the *apparent* harmful results.

We are, however, very ignorant of the effect of small, continued doses of the various tobacco poisons. All drugs comparatively harmless, such as lead, mercury, and arsenic, produce a highly injurious effect when taken in repeated small doses. Just what effect the use of tobacco

engenders we cannot absolutely know, but no physician doubts that smoking may be a factor in almost any disease from which his patient is suffering.

There can be, for instance, no question that smoke simply as smoke irritates the mucous membrane of the bronchial tubes and renders them more susceptible to infections; by irritating the mucous membrane of the nose and throat it tends to produce catarrh and therefore catarrhal deafness. It would therefore seem fair to state that the man who does not use tobacco is less susceptible to disease and contagion, and recovers more quickly from a serious illness or operation. From this we should expect to find that tobacco shows most in later life, when vitality is ebbing and the machinery of the body is beginning to wear. It is in his middle age that a man begins to feel the harm. In short, though we know only the precise or immediate effect of nicotine and only some of the morbid processes which excessive smoking may produce, it is likely that the worst aspect of tobacco is something that we do not know very much about—its tendency to reduce a man's general vigor.

The dominant characteristic of tobacco is the

fact that it heightens blood-pressure. The irritant action by which it does this sometimes leads to still more harmful results. Its second action is narcotic: it lessens the connection between nerve-centers and the outside world. These two actions account for all the good and all the bad effects of tobacco. As a narcotic, it temporarily abolishes anxiety and discomfort by making the smoker care less about what is happening to him. But it is a well-known law of medicine that all the drugs which in the beginning lessen nerve-action increase it in the end. Thus smoking finally causes apprehension, hyper-excitability, and muscular unrest. Here this inevitable law seems to give contradictory results. Every physician knows that an enormous amount of insomnia is relieved by smoking, even if it is at the expense of laziness the next day; at the same time every physician knows that most excessive smokers are troubled with insomnia.

CIGARETTES

In using tobacco we take the poison into the tissues. The chewer and the snuffer get the effect through the tissue with which the tobacco comes in contact. The cigarette-smoker almost

invariably inhales, and he gets the most harm merely because the bronchial mucous membrane absorbs the poison most rapidly. The tobacco itself is no more harmful than it is in a pipe or a cigar. Indeed, it is often less so in the cheaper grades, for, being less pure, it contains less nicotine. Furthermore, the tobacco is generally drier in a cigarette, and for that reason the combustion is better, for the products of the combustion of dry and damp tobacco are not the same. But since it is a little difficult to inhale a pipe or a cigar without choking, the smoke products of a pipe or cigar are usually absorbed only by the mouth, nose, and throat, whereas the inhaled smoke of the cigarette is absorbed by the entire area of windpipe and bronchial tubes. If you wish to see how much poison you inhale, try the old experiment of puffing cigarette smoke through a handkerchief, and then, having inhaled the same amount of smoke, blow it out again through another portion of the same handkerchief. The difference in the discoloration will be found to be very marked. You will note that in the second case there is hardly any stain on the handkerchief: the stain is on your windpipe and bronchial tubes.

If a man inhales a pipe or a cigar, he gets

more injury simply because he gets stronger to-bacco; but a man never inhales a pipe or a cigar unless he is a smoker of long standing or unless he has begun with cigarettes. Besides allowing one to inhale, a cigarette engenders more muscular unrest than any other kind of smoke. Because of its shortness, cheapness, and convenience, one lights a cigarette, throws it away, and then lights another. This spasmodic process, constantly repeated, increases the smoker's restlessness while at the same time satisfying it with a feeling that he is doing something. Yet despite the fact that cigarette-smoking is the worst form of tobacco addiction, virtually all boys who smoke start with cigarettes.

It is generally believed that in the immature the moderate use of tobacco stunts the normal growth of the body and mind, and causes various nervous disturbances, especially of the heart—disturbances which it causes in later life only when smoking has become excessive. That is to say, though a boy's stomach grows tolerant of nicotine to the extent of taking it without protest, the rest of the body keeps on protesting. Furthermore, many business men will tell you that tobacco damages a boy's usefulness in his work. This is necessarily so, since anything

which lowers vitality creates some kind of incompetence. For the same reason the boy who smokes excessively not only is unable to work vigorously, but he does not wish to work at all. This result, apparent during growth, is only less apparent after growth, when other causes may step in to neutralize it. Tobacco, in bringing about a depreciation of the nerve-cells, brings, together with physical results like insomnia, lowered vitality, and restlessness, their moral counterparts, like irritability, lack of concentration, desire to avoid responsibility and to travel the road of least resistance. If there were some instrument to determine it, in my opinion there would be seen a difference of fifteen per cent. in the general efficiency of smokers and nonsmokers. The time is already at hand when smokers will be barred out of positions which demand quick thought and action. Already tobacco is forbidden during working hours in the United States Steel Corporation.

Many men were prejudiced against smoking until they went to college. There they found themselves "out of it" because they did not smoke. More than that, they found that the smoke of social gatherings irritated their eyes and throat, and they thought that smoking might

keep them from finding other people's smoke annoving. A man who had left off smoking told me that at the first "smoker" he attended afterward he found the air offensive and his eyes smarting intolerably, although when he had been helping to create the clouds in which they were sitting he had not noticed it at all. These two experiences are common. For this reason, the social inducements to smoking are considerably greater than those to drinking. The man who refuses to drink may feel as much "out of it" as the man who refuses to smoke, but he has ordinarily, and in the presence of gentlemen, no other penalty to pay. He undergoes no discomfort in spending the evening in a roomful of drinkers, and he can manage to find things to drink that will have for them the semblance of good-fellowship. It is the social features that attend the acquiring and the leaving-off the habit which make smoking difficult to attack. In its present state, even if a boy were thoroughly familiarized in school with the harm tobacco would do him, he would still be seduced by the social side of it.1

¹ I have heard of a New Yorker who gave up his attendance as a member of the executive committee of a prominent and very useful reform association because, though an occasional

When a habit fosters or traditionally accompanies social intercourse, it is all the harder to

uproot.

What grounded opium so strongly in China was its social side. The Chinese lacked social occupation, and it was not the custom of the country for a man to find it with his friends and family, though no people are more socially inclined. Smoking opium became their chief social activity; they gathered together in the one heated room of the house to gossip over their pipes. We smoke tobacco as the Chinese smoke opium, "for company" and in company. Thus one must provide strong reasons to make a man give it up. He will not do so because it costs him something; he expects to pay for his pleasures. When a man has actually gone to pieces, it is comparatively easy to convince him that he ought to give up what is hurting him; but the average man has not been excessive enough for that, and has never brought himself to the point of serious conscious injury. Even a physician cannot with any certainty tell the average mod-

smoker, he could not endure the tobacco-laden atmosphere of the room where the committee met.

To this day his associates probably think him a very lukewarm worker in the cause!

erate smoker whether tobacco is hurting him. Consequently, if one would make this man stop smoking, especially when he sees that leaving off has caused some people more apparent discomfort than all their smoking did, one's only chance is to make him change his mental attitude. I hope to assist in doing this by calling attention to the fact that tobacco not only prepares the way for physical diseases of all kinds, as any physician will tell you, but also, as long investigation has shown me, for alcoholism and for drug-taking.

TOBACCO, ALCOHOL, AND OPIUM

The relation of tobacco, especially in the form of cigarettes, and alcohol and opium is a very close one. For years I have been dealing with alcoholism and morphinism, have gone into their every phase and aspect, have kept careful and minute details of between six and seven thousand cases, and I have never seen a case, except occasionally with women, which did not have a history of excessive tobacco. It is true that my observations are restricted to cases which need medical help,—the neurotic temperaments,—but I am prepared to say that for the phlegmatic man, for the man temperamentally moderate,

for the outdoor laborer, whose physical exercise tends to counteract the effect of the tobacco and the alcohol he uses—in short, for all men, tobacco is an unfavorable factor which predisposes to worse habits. A boy always starts smoking before he starts drinking. If he is disposed to drink, that disposition will be increased by smoking, because the action of tobacco makes it normal for him to feel the need of stimulation. He is likely to go to alcohol to soothe the muscular unrest, to blunt the irritation, he has received from tobacco. From alcohol he goes to morphine for the same reason. The nervous condition due to excessive drinking is allayed by morphine, just as the nervous condition due to excessive smoking is allayed by alcohol. Morphine is the legitimate consequence of alcohol, and alcohol is the legitimate consequence of tobacco. Cigarettes, drink, opium, is the logical and regular series.

The man predisposed to alcohol by the inheritance of a nervous temperament will, if he uses tobacco at all, almost invariably use it to excess; and this excess creates a restlessness for which alcohol is the natural antidote. The experience of any type of man is that if he takes a drink when he feels he has smoked too much, he finds he can at once begin smoking all over again. For that reason, the two go together, and the neurotic type of man too often combines the two. Tobacco thus develops the necessity for alcohol.

It is very significant that in dealing with alcoholism no real reform can be expected if the patient does not give up tobacco. Again, most men who have ever used alcohol to excess, if restricted voluntarily or involuntarily, will use tobacco to excess. This excess in tobacco produces a narcotic effect which temporarily blunts the craving for alcohol. Another way of saying the same thing is that when smokers are drunk they no longer care to smoke, a fact that is a matter of common observation. This means that there is a nervous condition produced alike by alcohol and tobacco. When a man gets it from drinking, he does not keep on trying to get it from smoking. As well as reacting upon each other, the two habits keep each other going. It is not altogether by haphazard association that saloons also sell cigars; they sell them for the same reason that they give away pretzels-to make a man buy more drinks.

This relationship between tobacco and alcoholism is not understood by the public. It has

been absolutely demonstrated that the continued use of tobacco is a tremendous handicap upon the man who is endeavoring to free himself from the habit of alcoholic indulgence. Only a man of the strongest character will persist in abstaining from alcohol unless he also abstains from tobacco, even after he has undergone the most intelligent medical treatment. In the system of a man already disposed toward alcoholic stimulation, no one thing will prove so positive a factor toward creating the sense of need as the use of tobacco. Physiological action of tobacco is to create muscular (motor) unrest. Most habitual smokers consume every day more than enough tobacco to carry them far beyond the point where its stimulating effect ends and its narcotic effect begins. Where this habitually occurs, the definitely toxic effect is notable, and this results in a demand for that stimulation which the tobacco itself once furnished, but now does not. Here is an evil effect of tobacco that is rarely understood and almost never admitted.

OPIUM AND CIGARETTES IN CHINA

Current history affords us a striking proof of the closeness of the relation between tobacco and opium.

I have spent a good deal of time in the Orient in the interest of those who were trying to subdue the opium evil, and I may add that there is in China to-day a flourishing American tobacco concern which has grown rich out of the sale of cigarettes. With the extremely cheap Chinese labor, the concern was able to sell twenty cigarettes for a cent of our money. Up to the beginning of this enterprise (about 1900), the Chinese had never used tobacco except in pipes, and in very minute quantities in rolling their own crude cigarettes. The concern was sending salesmen and demonstrators throughout the country to show the people how to smoke cigarettes. Now it is estimated that one half of the cigarette consumption of the world is in China. In trying to lessen the opium evil, in which they have to a considerable extent succeeded, the Chinese are merly substituting the cigarette evil. It is well known to the confirmed opium-smoker that he needs less opium if he smokes cigarettes. The Chinese to-day are spending twice as much money for tobacco as for opium.

I once said to a Chinese public man: "I can help you to get rid of the opium habit because you have found that you *must* get rid of it, but I cannot help you to get rid of the evil you are substituting for it, for not even America has yet found out that she *must* get rid of it. Your cure, I fear, is worse than your disease; and *our* disease has no cure—until we change our mental attitude."

If any one thinks that China is the gainer by substituting the one drug habit for the other, I beg leave to differ with him. The opium-smoker smokes in private with other smokers, and is thus not offensive to other people. He is not injuring non-smokers, or arousing the curiosity of boys, or polluting the atmosphere, or creating a craving in others. In the West the opium habit is generally condemned because the West is able to look with a new and unbiased mind on a drug habit that is not its own.

I consider that cigarette-smoking is the greatest vice devastating humanity to-day, because it is doing more than any other vice to deteriorate the race.

LIKE ACTION OF THE THREE HABITS

The more you compare smoking and drinking and drugging, the more resemblances you see. Opium, like tobacco and alcohol, ceases to stimulate the moment the effect of it is felt: it then becomes a narcotic. The history of the three

as a resort in an emergency is precisely the same. At the time when the average man feels that he needs his faculties most, he will, if addicted to any of the three, deliberately seek stimulation from it. He does not intend to go on long enough to get the narcotic effect, since that would be clearly defeating his own aims; he means to stop with the stimulant and sedative effect, but that he is unable to do. The inhaler of tobacco gets his effect in precisely the same way that the opium-smoker gets his—the rapid absorption by the tissues of the bronchial tubes. It may be news to the average man to hear that the man who smokes opium moderately suffers no more physical deterioration than the man who inhales tobacco moderately. The excessive smoker of cigarettes experiences the same mental and physical disturbance when deprived of them that the opium-smoker experiences when deprived of opium. The medical treatment necessary to bring about a physiological change in order to destroy the craving is the same. The effect of giving up the habit is the samecessation of similar physical and nervous and mental disturbances, gain in bodily weight and energy, and a desire for physical exercise. A like comparison, item for item, may be made

with alcohol, but it is the similarity with opium which I wish particularly to emphasize here.

TOBACCO AND MORAL SENSITIVENESS

Morphine, as is very well known, will distort the moral sense of the best person on earth; it is part of the action of the drug. Since the way morphine gets its narcotic effect is very similar to the way tobacco gets its effect, one would naturally suppose that tobacco would produce in a milder degree something of the same moral dis-This may seem a startling conclusion, tortion. but change your mental attitude and observe. Have not smokers undergone a noticeable moral deterioration in at least one particular? They have a callous indifference to the rights of others. This happens with all habitual indulgence, of course, but is it not carried more generally to an extreme with tobacco than with anything else? Few men quarrel with a hostess who does not offer them drinks, but all habitual smokers expect that, regardless of her own desires, she will let them smoke after dinner.

"We gave up the fight against tobacco in our drawing-rooms long ago," said a famous London hostess. "We found it was a case of no smoke, no men."

Respectable men in New York City who would not dream of deliberately breaking any other law carry cigars and cigarettes into the subway despite the fact that it is forbidden and that it is vitally necessary to keep the air there as pure as possible. A gentleman is more annoyed at being forced to consult another's preference about not smoking than about anything else that could arise in social intercourse, and is often at small pains to conceal his impatience with old-fashioned people who believe they have rights which should be respected.

On all sides the attitude seems to be, "What right has any one to object to my smoking?" The matter is really on just the *opposite* basis, "What right has any one to smoke when other people object to it?"

If a man must get drunk, we say he shall get drunk where he is a nuisance only to himself and to others of the same mind. If a man feels the need of interlarding his conversation with obscenity and grossness, we say he may not compel us to listen to him. But a smoker may with impunity pollute the air, offend the nostrils, and generally make himself a nuisance to everybody in his neighborhood who does not practise his particular vice. Is this not a kind of moral

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obtuseness? Change your mental attitude and consider.

The action of a narcotic produces a peculiar cunning and resource in concealment; it develops, when occasion arises, the desire to deceive and, whether occasion arises or not, the desire to shift obligation and evade direct responsibility. Tobacco does this more mildly than opium, and it does so more appreciably with boys than with men; but, as with opium, it is part of the narcotic effect in all cases.

Let it always be remembered that if a man smokes and inhales tobacco excessively he is narcotizing himself more than when he smokes opium moderately.

CHAPTER IX

TOBACCO AND THE FUTURE OF THE RACE

NEVER yet has tobacco done any good to a man. Its direct effect has been harmful to millions, and indirectly it has harmed many other millions by setting up a systematic demand for stimulants. Of all the widely used products of nature, tobacco finds the least excuse in real necessity. Virtually the only medical use to which the active principle of tobacco (nicotine) can be put is the production of nausea, and there are many other drugs that can be used with much better effect for that purpose. If one will study the pharmacopæia, he will find that, next to prussic acid, nicotine is rated as the most powerful known poison, and is not credited with a single curative property. From a medical point of view it is valueless.

The social standing of the man who took it from the tepees of the North American Indians to England is mainly responsible for its taking root there, for the acquisition of the tobacco habit is a painful process. Nature's revolt against it is much more instinctive than her revolt against alcohol. Furthermore, like any other form of poison, its effects are most immediate and evident upon the young and weak; for they are easier to poison than the mature and strong.

THE FULL EFFECT OF THE TOBACCO HABIT IS NOT YET APPARENT

To one who has made a careful study of the effects of tobacco the prospect for the future is not encouraging. The habit was already widespread before the extensive manufacture, or even knowledge, of cigarettes was introduced into the United States, and this later form of smoking, which is easily the most obnoxious and harmful of all, has not yet had time to disclose its full power for injury. For it is in the inhaling of tobacco that the smoker receives his greatest injury, and the habit of inhalation is peculiar to the cigarette-smoker. While there are smokers of cigars and pipes who inhale their smoke, it will almost always be found upon investigation that they acquired the habit of inhalation through smoking cigarettes. The average man with a cigarette history gets no pleas164

ure out of smoke which he does not inhale. Even if a cigarette is made of the best tobacco, undrugged, and wrapped in the purest of rice-paper, the mere fact that the smoke is almost invariably inhaled suffices to make cigarette-smoking the most harmful form of the tobacco habit. Inhalation is harmful because it not only exposes the absorbent tissues of the mouth and upper throat to the smoke, but thrusts the smoke throughout the throat, lungs, and nose, all of which are lined with a specially sensitive membrane of great absorptive capacity. Thus from the smoke of the cigarette the system takes up many times as much poison as it takes up from the uninhaled smoke of the pipe or cigar. Indeed, it may be added that the purer and higher the grade of the tobacco, the more harmful it is to the smoker, for the more will it tempt him into inhalation. Another danger of certain brands of cigarettes, principally the costly imported and specially flavored brands, is that to the extraordinary dangers of nicotine-poisoning found in all cigarettes are added in these higher grades the perils of their flavoring materials, from which even so dangerous a drug as opium is not always absent.

I believe that the evil effects of tobacco will be much more apparent in the next generation than they are in this; for forty years ago, when I was a boy, the lad who decided to begin to smoke knew nothing of cigarettes, and had only the pipe and the cheap cigar to choose between, forms so overpowering that they frequently discouraged him at the start. Thus many were undoubtedly saved from the tobacco habit; but now, with mild cigarettes upon the market, at very low prices, and in most States found on sale in every candy store, the situation has perils undreamed of at that earlier period. It is noteworthy that cigarettes are "doped" expressly to allay nausea, which is the normal effect of tobacco-smoking upon the uninured human system, and at the same time to quiet that motor unrest which is the first symptom to follow the introduction of nicotine into the human system. The narcotic effect of the adulterant drugs is therefore to ease the smoker's first pang and to make him more quickly the victim of the tobacco habit.

The smoker of cigarettes gets his narcotic by precisely the same mechanical process through which the opium-smoker gets his. The opium-smoker would find it far too long and expensive

a process to obtain the desired effect from opium by taking it into his stomach; but by burning a very much smaller quantity of the drug and bringing it into contact with the sensitive absorbent tissues of the throat and nose, he obtains the narcotic effect that his system craves.

THE USE OF TOBACCO DESTROYS MORAL DISCIPLINE

I am convinced that the use of cigarettes is responsible for the undoing of seventy-five per cent. of the boys who go wrong. Few boys wait until they are mature and their resistance is at its maximum before they begin the use of to-bacco. It would be remarkable if they did wait, for their fathers and their older brothers are constantly blowing smoke into their faces. Even where restrictive laws exist, minors find no difficulty in obtaining cigarettes, so that children of the age that is most easily harmed by the use of tobacco now habitually indulge in its most harmful form.

There is another unfortunate effect of the use of tobacco by boys. When they begin to smoke, they do so against the wishes and usually against the orders of their parents. This means broken discipline and deception. The

boy who endeavors to conceal the fact that he smokes is started along a path that is even more harmful than tobacco. He has to invent excuses for being absent from home, and to explain away the odor of tobacco that is sure to cling to him; and when a boy begins to lie about these things, he will lie about others. So far as truth goes, the bars are down. Furthermore, he has to spend more money. Unless he is one of those unfortunate youths who are not held to a moderate weekly allowance, too often he will resort to dishonest means to obtain the money to satisfy his newly acquired taste.

And that is not all. Boys who spend their time in smoking go where they will find other lads also engaged in the forbidden habit. They find congenial groups in pool-rooms, where they learn to gamble, and in the back rooms of saloons, where they learn to drink. The step from the pool-room or the saloon to other gambling-places and to drinking-places frequented by the unworthy of both sexes is an easy one. Thus the boy whose first wrong-doing was the smoking of cigarettes against the wishes of his parents soon becomes the target for all manner of immoral influences.

In these days of advanced sociological study,

when the mind of the world is set upon efficiency, it is astonishing that so little attention has been given to the effect of tobacco upon the young. To mankind at the present time nothing in the world is so important as the conservation of the boy. Humanity might well make any sacrifice conceivable in order to keep its boys clean. Keeping boys clean means keeping girls clean, and whatever keeps boys and girls clean purifies humanity as a whole. In other words, the boy is the most important thing in the world, and his cleanliness the most vital issue. Setting aside entirely the deleterious effect of nicotine upon his physical system, early smoking, which usually means the cigarette, is the most harmful single influence that is at present working against his welfare. We can appreciate the terrific total harm which tobacco does to youth, however, only when we add the psychological harm and the physical harm together. Everything considered, the question is an appalling one.

THE TEMPTATION TO USE TOBACCO

It is impossible to blame most boys very severely for yielding to the smoke-temptation; therefore it becomes a difficult matter to blame them for the wrong-doing which tends to follow

it. Their error is only the continuation of a similar error that their fathers have made before them and now tacitly encourage. It is difficult to make any lad believe that he need not be a fool because his father is one. Yet in most cases to save a boy from the demonstrable ills of tobacco-using entails just this course of reasoning. Orators and essayists from the beginning of time have found a stumbling-block in preaching to their followers virtues they admire and value, but do not themselves possess. father who forbids his son to smoke because it is harmful and expensive, while his own person reeks with it, is not likely to impress the lad very vividly with either the force or the honesty of his argument. More than one parent has found himself abashed in such circumstances by a son with logic and intelligence. For such a parent there is only one really honest course to admit to his son that he himself has been a fool, but that he does not wish his son to follow in his footsteps.

THE DANGER OF TOBACCO

There is no question in my mind that this matter of tobacco should be made the basis of

a very thorough educational campaign among the youth of the United States. The shocking spread of the tobacco habit among the women of American cities indicates, moreover, need for extending this instruction to girls as well.

If cleanliness of body is next to godliness, then cleanliness of mind is godliness, and cleanliness of mind, real cleanliness, is impossible while ignorance exists. Nothing in education is more generally neglected than the enlightenment of the young—an enlightenment which can come only from the mouths of elders who are themselves clean—as to the deadly nature of alcohol, habit-forming drugs, and tobacco. I should very much dislike to send a young and impressionable son for instruction in any subject to any teacher, male or female, who used cigarettes. Thousands upon thousands of parents in this country feel as I do on this subject; but while they realize the danger which might result from the influence of a teacher who smokes, they utterly neglect the far more dangerous and powerful influence of a father who smokes. To my mind, however, it is essential that parents should seriously consider the personal character of the men to whom they intrust the education of their boys.

But the use of tobacco reaches far beyond the home circle and the schools and even pollutes the atmosphere of the church itself. There are few clergymen in the United States who do not use tobacco, and so a clean father who rears a clean son is under the tragic necessity of urging his attendance at a dirty church, and later on sending him to be a student in a dirty college, for the simple reason that there are no clean ones.

Society seems to have been viciously organized for the destruction of the boy, in whom lies its chief hope of preservation and improvement. The boy who keeps clean does so against tremendous odds, to which frequently his father, his school-teacher, and his clergyman are the chief contributors. A dozen times during every day of his life he is subjected to the third degree of temptation, and twice out of three times this ordeal is thrust upon him by the very persons who really should do most to safeguard and protect him. And now that society has set its sanction upon the use of tobacco by the women of the nation, he is confronted with the further peril of a mother who smokes. It seems to me that this tobacco question detracts enormously from that very vivid hope we might feel for the rising generation, which is also handicapped with alcohol and drugs.

TOBACCO ADDICTION MORE DANGEROUS THAN DRUG HABIT OR ALCOHOLISM

I have no desire to moralize upon the subject of tobacco. I am not a moralist, but a practical student of cause and effect, urging the elimination of bad causes so that bad effects may be eliminated in turn. A very wide experience in studying the result of the use of narcotics has convinced me that the total harm done by tobacco is greater than that done by alcohol or drugs. Nothing else at the present time is contributing so surely to the degeneration of mankind as tobacco, because, while its damage is less immediately acute than that done by alcohol or habit-forming drugs, it is, aside from its own evil effects, a tremendous contributory factor to the use of both. There is nothing to be said in its favor save that it gives pleasure, and this argument has no more force in the case of tobacco than in the case of opium. Any man who uses tobacco poisons himself, and the very openness and permissibility of the vice serve to make the process of self-poisoning dangerous to the public as well.

To sum up, the tobacco habit is useless and harmful to the man who yields to it; it is malodorous and filthy, and therefore an infringement upon the rights and comforts of others. Its relation to alcohol is direct and intimate. When an alcoholic comes to me for treatment, I do not regard my chances of success with him as good unless I can make him see that to abandon smoking is a necessary step in his treatment. My deductions concerning the intimate relationship between the use of tobacco and liquors are the result of years of observation and study. And if it is true that no man whose system is alcoholic is fit to be the father of a child, it is no less true that the habitual smoker is also unworthy to be a guardian of his kind. The alcoholic fiend almost invariably becomes the parent of children provided with defective nervous systems, of children as definitely deformed nervously as they would be physically if born with club-feet or hare-lips.

CHAPTER X

THE SANATORIUM

THERE is no class of patients in the world to whom the physician, and especially the physician who conducts a sanatorium, can offer so good an excuse for long-continued treatment as to those addicted to the use of drugs. certain that the person who makes a weekly charge to such patients is rarely honest with them or tries to shorten their stay. Several years ago I freely and without reservation gave all the details of my treatment to the medical world, and though many institutions have endeavored to install it as a part of their own curative policy, most have failed. The failure may be attributed principally, if not wholly, to the fact that few have also adopted the necessary principle of a fixed charge, without regard to the length of time the patient is under treatment. The weekly charge, with its attendant temptation to keep the patient as long as possible, has invariably defeated all possibilities of success.

There is also a class of institutions in which the "cure" for the drug habit consists in the administration of the drug itself in a disguised form. In such surroundings a patient will contentedly stay indefinitely, for the chains of his habit bind him to the spot. The very fact that he wishes to stay may be accepted as a proof that he has not been benefited by it. For the man who has been freed from a drug habit desires a normal life in the world; indeed, only his reëntrance into its turmoil and bustle can set him surely on his feet.

The average sanatorium, accustomed to the time-honored and thoroughly established system of making its patients comfortable,—in other words, pampering and coddling them,—finds it difficult, if not impossible, to conform in every detail to the necessities of a system like mine.

Even if the institution is equipped with every possible facility, it is highly probable that the physicians in charge may be mentally unfitted to the work. Inured by every detail of their training to methods that make a successful treatment of drugs impossible, they find themselves incapable of changing when confronted by specific cases that demand a radically differ-

ent treatment. The institutions themselves are equally inadaptable. The sanatorium, it must be remembered, is really a boarding-house or hotel, and the business of boarding-house or hotel, whether it presents an epicurean or "sanitary" bill of fare, or whether its staff is supplemented by trained nurses and physicians or not, remains a boarding-house or hotel. Its main province is to keep its paying guests and to make them comfortable.

The whole sanatorium situation so far as it relates to the "cure" of those addicted to the use of drugs and alcohol may be summed up in a few words. The average sanatorium is merely a small colony of drug-users. No one can deny that. Now, no man who has been freed from his desire for drugs and no one who is being made uncomfortable by deprivation will remain in such surroundings for any length of time. The natural conclusion is that such institutions are not accomplishing what they have promised to be able to accomplish. The inmates are still drug-users. This is not true of American institutions alone. Within a few months I have had as an eleven-day inmate of my own institution a very wealthy man who has made three European journeys to find relief from the drug habit, on each journey going the rounds of six or eight celebrated institutions, and taking the treatment of each without result. Successful treatment is brief treatment, and no establishment operating upon a system of a weekly charge to patients will make an earnest effort to release these patients as soon as possible. In their desire to make their patients comfortable, and so prolong their stay, their usual quantity of drugs is supplied to them, though of course in some disguised form. There is no other way of accomplishing this.

Moreover, so long as a patient is thus kept comfortable, he is unable to describe his symptoms, for he does not feel them. The drug, therefore, hides exactly those details of a man's condition that it is essential for the attending physician to know. In a normal man the presence of pain is always a guide for a physician, but in a drugged case this is always absent. The constant drugging that conceals the symptoms of organic ailment may permit one of comparative insignificance at the time a patient entered a sanatorium to become incurable before he leaves. Thus the result of his stay may mean in the end a serious or even fatal deterioration.

And the prolonged stay becomes a means, intentional or unintentional, of mulcting the patient or his friends of money. The sum annually spent in the United States upon useless sanatorium treatment must certainly amount to millions. I have had patients come to me from such institutions to which they had paid sums as large as \$10,000. Wealthy people are specially likely to become victims of this form of rapacity, and a mere glance at some of the receipted bills that I have seen in their possession is enough to stagger a modest financial imagina-The ingenuity with which a sanatorium manager devises "extras" is worthy of the name of genius. And the physically incurable patient is often retained in the sanatorium till his money or the money of his friends is exhausted in a needless sacrifice to greed.

THE PHYSICIAN'S ATTITUDE TOWARD THE DRUG-USER

It is also necessary to direct attention to some of the errors of the general medical practitioner who deals with cases of this sort. It is not unnatural for a doctor to hesitate at the thought of surrendering his patient into strange hands. There may be unselfish as well as purely mercenary reasons for this hesitation. The doctor

may hope that he himself can aid the sufferer. and may therefore endeavor to administer this treatment either in the patient's home or possibly in his own residence or private hospital. The patient is likely to be as much inclined to this course as the doctor, for the doctor is his friend and confidant, and he dislikes intensely the idea of revealing what he regards as the shameful secret of his enslaved soul to strangers' ears. Treatment in the doctor's or the patient's own environment must of necessity be an expensive matter, but if the patient can afford it, he is likely to desire it. This is most natural, especially if the patient is one of the tens of thousands who have tried the treatment offered by a sanatorium and found it not only valueless, but horrifying. There are, too, many patients who from sheer lack of funds naturally desire a home administration of the treatment as a means of saving expense. Of course many of the most worthy cases are to be found among people of moderate or small means. The drug habit is itself impoverishing.

Even so I find myself irresistibly impelled to advise against any attempt to treat such cases in their own environment, or in any environment improvised by a local doctor. This I do only because I have known so many cases of utter failure, so many cases where the sufferer's final hope has been destroyed by such experiments.

PRIVATE ADMINISTRATION OF TREATMENT NOT SUCCESSFUL

The friendship existing between a physician and his patient must often disarm the former and incapacitate him for the strict dealing that is required in a treatment like mine. The mere fact that in caring for a friend or one of his regular patients the doctor feels unwilling to exact a definite charge in advance is a certain handicap here, as is also the fact that each patient needs continual watching, and no doctor can afford to devote his entire time and constant medical attention to one patient. The average doctor in private practice, moreover, finds it impossible to secure upon demand nurses of sufficient moral responsibility and medical assistants of sufficient technical training to cooperate with him in the work. Above all, I find that only when the patient is on premises other than his own, in unfamiliar surroundings where he is subject to a strict and inviolable discipline, can the best results be obtained. The doctor who administers this treatment, if he is to win, must have every advantage. Hospital surroundings, unfamiliar nurses, and strange assistant doctors are of great value; but payment in advance may be regarded as the most effective means for inducing the patient to complete the necessary course. An amazing number of people have come to me who have confessed that while they have from time to time tried other treatments, they have never completed one of them. Others come in a skeptical frame of mind. I can mention one such who had been three times to Europe, each time on the advice of the very doctor who, as the patient was aware, had been responsible for his forming the habit.

No physician in private practice should ever attempt to relieve a patient from a drug habit in a manner incidental to the conduct of his practice, though it is nevertheless true that the temptation for doctors to attempt this are extraordinary. A patient who becomes aware that his physician knows of a treatment which will bring relief is likely to bring to bear upon the physician every possible pressure in the effort to induce him to administer it. The doctor must be liberal indeed who, having made such an attempt and failed to achieve good re-

sults with it, will acknowledge that he was mistaken at the start.

THE NECESSITY OF A FIXED CHARGE FOR TREATMENT

The advantage of a definite charge, paid in advance, was a discovery that I made early in my work. With a large proportion of my patients it would otherwise have been impossible for me to obtain the definite medical result which has characterized my work.

It is quite impossible to make an intelligently satisfactory mental or physical diagnosis of any patient brought to me until he has been entirely freed from the drug which he has been taking. As soon as this has been fully accomplished, it is possible to consider the case carefully. It is also necessary to make an invariable rule that no person entering my institution for treatment shall be permitted to come into contact with any other person who is there for treatment, for there can be nothing psychologically worse than the discussion of symptoms and the exchange of experiences among people under treatment. It is also a rule that in the institution physicians employed in the establishment shall not become intimate with the patients or spend with them any time not necessarily devoted to professional investigation and attendance.

Nurses also must be as businesslike as possible in all their relationships with patients, and must do as little hand-holding and sympathizing as possible even in the cases of ultra-nervous women patients. It is a principle of the average sanatorium to encourage the "sympathetic" nurse. Wittingly or unwittingly, the old-time sanatorium made a practice of manufacturing habitual sanatorium inmates. The most hopeless cases I have ever seen have been those who have become inured to wearing sanatorium stripes. Such will never change their tailor till their pocket-book becomes empty.

Another detail of my treatment not easily compassed in the average sanatorium is to consider every case as an individual case, to be dealt with individually. In private practice this is often overlooked, and to this I also attribute many failures in treatment. The individuality of every case must be borne in mind not only throughout the treatment itself, but afterward, during the period of recuperation. The case itself is sure to indicate in some measure the further treatment which should be followed in the period immediately succeeding the pa-

tient's discharge from my institution, and very frequently indicates, in fact, the necessity for consultation with other specialists and for a surgical operation. After the patient has been relieved of drugs comes the time to begin the necessary physical upbuilding by means of exercise. Although I may have seemed to condemn the sanatorium, I must add now that some institutions are specially qualified to assist in this building-up process. Some health-building institutions that devote their entire attention to strengthening their patients by means of physical exercise are doing wonderfully good work.

The fact that my methods in treating these cases have prevented me, and will prevent me, from becoming directly or indirectly interested in any institution other than my own, in New York City, gives me a freedom in offering advice to patients concerning what they should do after they have left my care that I should not feel if my institution were operated upon the old-time keep-them-as-long-as-you-can plan. I find it possible to suggest physical exercise and even professional training to those who especially need it with entire disinterestedness, just as I find it possible to suggest to some an investigation of some religious influence.

It must be laid down as an axiom that the patient must have a mental as well as a physical change before the treatment can accomplish all the good of which it is capable. Such a mental change is highly improbable in the comfortable surroundings of the average sanatorium. No man or woman ever achieved it by sitting on a pleasant veranda in an easy-chair exchanging tales of symptoms with other invalids.

THE REASON FOR THE FIXED CHARGE

The principal consideration which has influenced me in shaping my policy of a definite charge and limiting the length of stay of my patients has been the fact that I find it impossible when the effect of the drug has been perfectly eliminated to hold most of the patients under restraint. The man who has won freedom from his habit feels sure of himself; he desires to get away, and he is not afraid to go out into the world, where it may be possible for him to get the drug again. He will not yield to the temptation to get it, partly because he will not want it, and partly because he knows the horror of the habit and does not wish to become involved in it again. As a matter of fact, one of the hardest tasks I have is that of inducing

people to stay as long with us as we think necessary, although their prolonged stay means no additional payment to us and no additional expense to them.

That is one of the principal arguments against colonization; and it is as much an argument against the average municipal or state institution as it is against the average sanatorium. The theory of colonization in this matter is all wrong.

The question of a definite charge has as much influence on my own attitude as on that of the patient. From the fact that I know when a patient enters my house that I can get no further money from him or her beyond the advance payment I gain a distinct advantage. I do not feel it necessary to cater to my patient's whims, nor do I feel it necessary to sacrifice any portion of the necessary routine of the treatment because the patient may be rich or influential and may make extraordinary demands upon me. All that I have to do is to go ahead along those lines which I know are effective and which will gain results.

The effect of this system is equally admirable upon the members of my medical staff, for our efforts are devoted not to keeping the patient as long as possible for the purpose of increasing revenue but to getting rid of him as quickly as possible, so that the profit will be relatively large. That it is to his advantage as well as to mine to see that the treatment is complete and effective before the patient leaves is obvious.

These methods take into consideration my own and my patient's psychology. A man who deals with this type of patient needs every advantage which he can get, for invariably he is dealing with abnormalities.

PHYSICAL DEFECTS REVEALED BY TREATMENT

The treatment itself is certain to uncover these abnormalities, revealing whether or not they are due to physical causes. It becomes very quickly evident if there is any real physical reason why a patient is not eligible for treatment, as in the case of an incurable and painful physical ailment. No matter how careful and frank a patient's statements may be or how elaborate the diagnosis that his physician has transmitted to me, no matter how elaborately careful are the preliminary examinations made by my own physician, it is not until the drug has been entirely eliminated that we find it possible

to make a really intelligent diagnosis. The symptoms of disease, however, are sure to appear before the first part of the treatment is completed. It is a standard policy of my hospital at once to inform a patient who has proved to be physically ineligible, and to return to him his fee.

This method of procedure has made us careful before accepting patients to study their histories, for, naturally, we do not wish to do even preliminary work and then return the fee in full. We accept no patient for treatment until we are provided with a careful and detailed history of his case, and it is upon a large collection of such histories that I have based many of the theories embodied in the subject matter of this book. It is especially these detailed histories which have enabled me to fix with some accuracy of judgment the circumstances leading up to the formation of most drug habits. In our invariable practice of returning the fee and discharging the patient whom we find ineligible for treatment we have surely taken a step in advance. There is scarcely an institution of this sort in the United States to which a patient might write, "I am taking drugs," without receiving in reply the invitation, "Come to us, and we will treat you," implying that they will give the treatment whether or not an examination of the patient shows that he is one who can benefit from it.

THE DUTY OF THE MEDICAL PROFESSION

The victim of drugs, whether he is rich or poor, old or young, good or bad, deserves the public sympathy in a measure scarcely equaled by any other class. These folk are sick folk in every way I can possibly think of. I am attempting to see to it that they are protected by every safeguard from being victimized. It is my hope that through continual and untiring education I may force the state medical institutions throughout the country to assume their rightful responsibility in providing proper care for drug victims who have slight means or none. I purpose to work toward the awakening of the medical profession to its responsibility not only in regard to the growth of new crops of drugusers, but to the care and relief or sequestration from medical practice of those among its own members whose condition warrants action.

Perhaps this last step should be the first one to be taken. I have given it much thought, and can see only one way out of the veritably infernal tangle in which the medical profession has enmeshed itself. That would involve a conference between delegates from the medical societies of the various States to form a plan whereby the medical profession as a whole or in groups might establish and support an institution or a number of institutions. These should be backed by the most eminent and conscientious men in the profession. They should be managed by men fully competent, and should be open not only to physicians who need treatment and are unable to pay for it at a private institution, but to all patients, in the certainty that there they will receive the proper treatment, properly administered, and at a reasonable charge. I purpose furthermore that every institution under private management in the United States shall by law be held responsible for its methods of treatment.

LEGISLATION TO REGULATE SANATORIUMS

There should be the most drastic legislation compelling all physicians and institutions accepting this class of patients for treatment to report periodically to the board of health which has jurisdiction in their district whenever, after a three weeks' medical supervision, they still require the administration of habit-forming drugs. It is only reasonable that any institution accepting a patient for this treatment, and failing to secure favorable results within a period of twenty-one days, should report the case to the authorities, giving detailed reasons for the failure of the patient to respond to treatment.

The general adoption of this rule of procedure would mean that a class of unfortunates who have never had any protection from any source would be immediately provided with definite medical help. An accompanying provision would insist that patients who for physical reasons are found to be ineligible for treatment -unable, that is, to exist in comfort without regular doses of their drug—will be relieved of all sense of disgrace arising from this necessity, and will be preserved from victimization, and will find it possible to get the drug without difficulty and at reasonable prices, if necessary, from the boards of health themselves. If this plan accomplished nothing more than to prevent the operation of medical fraud against sufferers for a period longer than three weeks, it would even then have accomplished an extraordinary good.

I have in my present hospital only fifty beds, and as a rule I receive and discharge about four patients a day. Were my institution operated along the colonization lines which are common in the United States, the volume of business which I handle in a year, running well above a thousand patients, would require not fifty, but at least five hundred beds, and rooms in proportion. This statement of the exact situation in my own institution may possibly explain existing conditions in some others.

It must not be understood that I attribute all the efforts at colonizing drug-users to unworthy motives. Much of it has been due to the complete ignorance of the medical profession in regard to this form of affliction. Finding itself unable intelligently to cope with conditions, it seeks the line of least resistance and adopts the colonizing sanatorium, with all its evils, as the best plan that can be found. When I first took up this work I went for information and assistance not to the humble members of the medical profession, but to the most eminent men whom I could find. Even these men invariably admitted their ignorance of the nature of the drug habit and the means for its relief. I was told by some of the best-known neurologists in the world that out of thousands of patients whom they and their confrères had sent to the best-known and most conscientiously operated institutions in the country not one had really been helped. They assured me that if I had found something which would give actual and material aid in any degree to even five per cent. of the drug victims who were sent to me for treatment, I would be doing more than any man had ever done before.

CHAPTER XI

PREVENTIVE MEASURES FOR THE DRUG EVIL

EARLY in my investigations into the proper facilities for the medical treatment of drug-users it became apparent that this could not be properly carried out in the patient's own environment, in a general hospital where new facilities had not been introduced, or in the usual sanatorium. It became necessary for me then to outline some system by which the medical profession might properly take up the work and to suggest some basis on which the medical men of various States might combine in an effort to remove the treatment of these sufferers from the hands of the irresponsible.

Some, if not the majority, of the worthiest subjects of the drug habit are people who cannot pay large sums or travel long distances in their search for relief. It seemed clear, therefore, that state institutions should be equipped with facilities and knowledge for dealing with this affliction.

THE NEED FOR PRACTICAL INSTRUCTION

At the present time there is in existence no clinic or other practical place of demonstration where a doctor can get competent instruction in this important branch of medical work. I hope the time will come when it may be possible for me to offer to the medical profession a clinic where the professional student may prepare for this line of effort as effectively as he may now prepare himself for any special work, like nose and throat diseases. This can come about only through some arrangement in which I have no financial interest.

SKEPTICISM OF THE MEDICAL PROFESSION

I am fully aware that I must first overcome a strong undercurrent of skepticism among the members of the medical profession. The efficacy of the treatment must be proved. Even among the best-informed physicians it is a popular belief that the treatment which I announce as simple is really an impossibility. No matter what the doctor has hoped that he might do, he has been told by text-books and articles in medical periodicals that it cannot be done. This fallacious teaching must be counteracted before

much can be accomplished, and in the progress of the work many traditions of the profession must be violated. Before he can hope to accomplish anything of importance in the administration of my method of treatment, the physician must understand that the length of time a drug-user has been taking the drug, the quantity that he has taken, and the manner of its administration are matters of no consequence. Short histories and small amounts, long histories and large amounts, are all one when it comes to the administration of this treatment. I went to Dr. Richard C. Cabot of Boston with a letter of introduction from Dr. Alexander Lambert of New York, whom he knew well and admired. He listened to my statement of the facts which I have just set forth.

"I have heard what you say, but I shall not believe it until it has been demonstrated to me," he declared.

I demonstrated it, and convinced him. A similar skepticism remains general throughout the medical profession.

The experience that the medical profession has already had in New York State as the result of prohibitive legislation indicates the many problems that arise immediately after the drug is put beyond the reach of those who have acquired the habit. It is only natural that the unscrupulous should seek to take advantage of the opportunities created by this situation. Without proper treatment, an habitual drug-user cannot endure the agony of deprivation until a definite physiological change has occurred; so that unless the medical profession is informed of this fact, and the community at large is provided with facilities for the administration of the required treatment, it is almost inevitable that restrictive measures will be followed immediately by the victimization of the unfortunate by the unscrupulous. One detail of the peril to society which may accrue from a general cessation of the drug traffic without the provision of proper facilities for the care of those who have been its victims is that those who are accustomed to drugs, on being suddenly deprived of them, almost invariably turn to alcohol for stimulation and, without being the least relieved of the drug habit, with abnormal speed become alcoholics. Modern society presents few spectacles of suffering more acute than that endured by the drunken drug-fiend. Few persons, moreover, are so dangerous to its welfare.

MEDICAL ETHICS

Constantly I must lay emphasis upon the responsibility of the physician in regard to drug habits. This phase of the subject must be an ever-recurring one, because the whole unpleasant situation has grown out of medical ignorance. While treatment for drug-users is at last making headway, for a long time experimentation had no chance save with a small number of broad-minded and bright-minded doctors who were able to shake off the shackles that held the less intelligent members of their profession.

When I made public the formulas of my treatment, I did not understand this phase of medical ethics. I assumed that certain dangers might arise from the probable activities of the omnipresent medical faker, who without any genuine effort to administer my treatment properly would advertise it widely, and thus victimize the innocent. I also assumed that the medical profession would eagerly grasp the idea, put the treatment into operation, to their own benefit and that of the world at large, and by the very beneficence of their work far more than offset the harm the charlatans would do.

Both of these assumptions proved incorrect.

The fakers avoided even counterfeiting my treatment, because the articles which had announced it in the medical and lay press had made its brevity clear to the public; they did not care to promote any treatment in which their victims would be justified in demanding immediate relief. From that real peril the community was thus saved. But the general indifference of the medical profession was equally surprising and at first somewhat discouraging. I have since decided, however, that this was perhaps fortunate; for as the work develops, it becomes more and more apparent that it is a strictly hospital treatment, and cannot often be successfully administered in the environment of the home or in the regular course of a general practitioner's daily work.

In another part of this book I shall have more to say about the medical buzzards who, working outside of medical ethics and in defiance of the usually admirable spirit of the profession as a whole, without regard to financial or ethical honesty, indulge in whatever practices seem to promise them the greatest profit. How dangerout these men are not only to the patient, but to the profession has many times been illustrated. Various medical discoveries imported from

abroad or achieved and announced by eminent American medical men have brought flocks of unscrupulous practitioners to New York, not with the progressive desire to study and honestly apply these new theories for the benefit of their patients, but with the idea of learning barely enough about them to enable them to offer credulous sufferers cheap and worthless counterfeits at exorbitant rates. Where secret methods have been heralded, they have bid against one another frantically to secure locality privileges, working to this end with all the fierce competitive enthusiasm shown by eager commercialists seeking county rights to a practical and popular patent flat-iron. It is my earnest hope that the wave of reform which has begun in New York State, and which undoubtedly will carry new and effective drug legislation into every State of the Union before it loses its forward impulse, may not revitalize these unworthy schemers. It was partly the hope of preventing this evil that led to the writing of this book.

The progress of intelligent legislation will fill the land with much suffering from the tortures of drug deprivation. Therefore events have placed a solemn obligation upon the medical profession to satisfy itself of the efficacy of my treatment, even though a new organization for that purpose should be necessary. After the profession is assured of the value of the treatment, many should achieve competence in its administration. Then it will become a matter of duty to see that every community is provided with facilities and a staff of experts sufficient to meet the special needs that may arise there. If such an organization should be formed, I should be glad to devote my services to it.

THE AUTHOR'S EXPERIENCE WITH THE DRUG HABIT

My opportunities for observation in this field have extended over fourteen years of constant study. They have included investigations in the Orient and Europe as well as in the United States, and have dealt with patients of every class. Early in my work I found it difficult to secure subjects, and presently saw that I could do so only by personally searching the under-world for them.

It was a complicated task, full of unexpected problems. As I could not engage salaried people for the carrying out of the details of the treatment, it became necessary for me to do everything except the medical work, and to assume all except the medical responsibility. But what I at first deemed a hardship proved in the end to be an advantage, for if I had had plenty of money with which to carry on my work, I should never have mastered its details.

It may be that the need for making the work strictly self-supporting from the start led to one of my first important psychological discoveries: that any person worth saving is either able to pay a reasonable amount for treatment or can make the price of it a deferred obligation of such a character that it will certainly be met. The experience from which this and other statements in this book have been deduced is not an experience gained from casual or even regular daily calls of a few minutes or a few hours upon the patients under treatment, but is due to years in which I have frequently spent twenty-two hours out of every twenty-four in the same building with them, and subject to their constant call.

After having proved the efficacy of treatment at home it seemed advisable to make a journey to the Orient, where drug habits were notoriously more common than elsewhere. It was the desire to study them at first hand and literally by wholesale which led me to China, where I opened three hospitals, and in the course of eleven months supervised the treatment for the opium habit of over four thousand Chinese. During this period I treated all who presented themselves, the ages of those to whom relief was given ranging from eighteen to seventy-six. Among the four thousand patients not one fatality occurred, although many of them were extreme cases, and I was able to obtain the assistance of only one foreign physician who could be considered responsible. The rest of the work was done by untrained Chinese boys, who administered the capsules at stated hours, and not one of whom was capable of intelligently counting a patient's pulse.

I have said that not one fatality occurred. It is pleasant for me to add that during the whole fourteen years of my practice, although I have had thousands under treatment, many of them in exceedingly bad physical condition at the time the treatment was begun, with their drug symptoms complicated by various and serious physical ailments and often accented by alcoholism, only four cases have died.

SUCCESSFUL ACHIEVEMENTS IN THE CURE OF DRUG-USERS

A new precedent has been established with cases of this character in the course of my hospital experience. For the first time the treatment has been reduced to a definite hospital system, during which the resident physician is never divorced from his patient, and in the course of which complete and elaborate bedside histories and charts are kept. I have in my possession at the present moment the complete bedside notes of every patient to whom my treatment has ever been administered. I call attention to this fact because it shows that the work has not been hit or miss, but has been as carefully systematized and made as highly scientific as it has been possible to make it.

A second precedent has been set, as is proved by the fact that within a brief time any case of drug or alcoholic habit that is not complicated by physical disabilities due to other causes can be successfully treated in a few days without heroic methods and without risk.

This has at once proved the fallacy of old methods. It has demonstrated how false, for instance, is the principle of colonization. As I have said, drug cases should never be colonized, and among alcoholics only the absolutely hopeless inebriate should be subjected to this method of treatment. With the latter, of course, there is no chance of real relief, so that here colonization offers a means of relieving society of all of the burden upon the police which the inebriate's freedom necessarily implies, and from a large part of the economic burden which his existence entails upon the community.

MAKING SANATORIUM CONVICTS

For drug-users colonization is the worst possible treatment that can be followed. From what I know of the conduct of the average sanatorium at this time in the United States, I feel absolutely certain that no person could possibly be helped if sent there, and I am convinced that definite and virtually incalculable harm would be the almost inevitable result of following such a course. Drug-users, as well as alcoholics, who are sent officially or otherwise to institutions of this character become what are called "sanatorium convicts." These cases are virtually hopeless, and are little less pitiable than that of the "lifer" in a prison. There are in the United States many people of the better

class who through no fault of their own have became afflicted with the drug-habit, and who have drifted from bad to worse until a sanatorium has been the only recourse left.

Treatment for drug and alcoholic habits and treatment tending toward the recuperation of the patient cannot be carried out together with one patient or even simultaneously with several patients in the same institution. An understanding of this fact has placed me in an advantageous position for giving advice about whatever remains to be done when a patient is ready to leave my hospital. I have always worked in the closest and most perfect harmony with physicians who have sent cases to me and have never permitted any of the doctors employed in my institution to visit a patient who has left my care. On the other hand, no physician who has brought a patient to my hospital has ever been divorced from him as a result of his stay with us.

ACCURATE DIAGNOSIS POSSIBLE AFTER TREATMENT

Physical revelations which follow the unpoisoning of patients frequently startle the patients themselves as well as the physicians who have their well-being in charge for long periods. Nor are the mental revelations less astonishing. There have been many cases, after the unpoisoning was complete, in which a man or woman has been found to be as seriously ailing mentally as others have been found ailing physically. Drugs and alcohol, especially drugs, have frequently been responsible for extraordinary mental and moral twists. But it must be maintained that the use of drug or liquor is usually the result rather than the cause of such conditions. There are many cases in which no type of medical help will bring about satisfactory permanent results, though other victims, after the elimination of alcohol or narcotics, quickly take their places as useful and admirable members of society.

The problem confronting the physiologist after a patient has been relieved of a drug or drink habit is comparatively simple. If this relief makes diagnosis possible and reveals the existence of an unsuspected, but curable, ailment, the course to follow is obvious. With the psychologist the problem is frequently far more complicated. The useless citizen who becomes a drug- or drink-user will remain a useless citizen after the drug or drink habit has been eliminated.

To this class belong most of those who readily relapse into their old habits after their systems have been thoroughly cleared of the physiological demand for the substance of their habit. Thus perhaps the most important query the psychologist interested in this work must ask after the treatment of a patient is, What is left of value, and what can be done with it? It is a curious fact that usually more is left in the case of a poor than in the case of a rich patient. No one is so hopeless as the vagrant rich. No man will ever make a reputation in work of this character who deals wholly or even principally with people to whom money has no value.

UNPOISONING THE USER IS ONLY THE FIRST STEP

My work has brought me to the conclusion that few physicians seem able accurately to classify their own patients. Even the specialist in psychology, who should be able to weigh all the details of men's mental and moral as well as physical being, seems likely to go astray when he considers a psychology that has been affected either by drink or drugs. Many physicians seem to be imbued with the idea that after a patient has once been through the process of

treatment for a drug or drink habit he will be entirely made over; but the fact is that the elimination of drugs or drink from a degenerate will not eliminate degeneracy. Nothing, in fact, will eliminate it except stopping the breeding of degenerates.

In my work I have found it necessary sometimes to seek advice from as many as half a dozen physical and psychological specialists in connection with one case. While instances have been very numerous in which several specialists have been really required for the welfare of the patient, the need had been so thoroughly concealed by the patient's drug habit that it was not apparent until the effect of the drugs was thoroughly eliminated.

NECESSITY FOR CAREFUL PSYCHOLOGICAL STUDY

In most instances expert treatment for the mental condition after drug or drink elimination is as essential as expert attention from the doctor of medicine, and if success is to be achieved, must be regarded as an entirely separate task. Habitual users of drugs or drink are literally human derelicts. The symptoms of their true condition are submerged, and to clear them of

their concealed weaknesses it is necessary to lift them like a barnacle-ridden hulk into the dry-dock for investigation and repair.

I regard as a preferred risk among the victims of the drug habits those who have acquired it through the administration of a narcotic by physicians in time of pain or illness. Such a case, if treated before too great a deterioration has taken place, may be considered almost certain of relief, provided no other ailment discloses itself.

On the other hand, where the drug habit is the direct or indirect result of alcoholic dissipation or sexual excesses, or is a social vice, the case is extra-hazardous. Here the lack of moral standards and the loss of pride are serious handicaps. These matters are of extreme importance to the physician who is considering the care or treatment of cases of a drug habit. That he should classify his subjects of investigation, recognizing the hopeful ones and admitting the hopeless to be hopeless, is essential to successful work. He must know the material with which he has to work; familiarity with his material is as necessary to him as it is to the carpenter. Many cases have been brought to us that we have declined to accept because we could hope to accomplish nothing with them. Not long after I began my work I tried to help a man against my better judgment; I felt reasonably sure that he lacked the worthy qualities that would make him cling to and appreciate whatever advantages the treatment might afford. My estimate of his character proved to be correct; the man relapsed, and became a traveling liability on me, a reproach against my institution and my treatment.

THE HOPELESS CASE

I have already said that the idle rich to whom money has no value cannot usually be classed among hopeful subjects for treatment. The same may be said of those for whom others take financial responsibility, paying the cost of their treatment. If such cases do not already belong in the human scrap-heap, this mistaken kindness is very likely to place them there.

However, I believe that those among this class who have become public charges and refuse to work should be forced to do so by state or municipal authority. Society or their own families should not bear the burden of their useless existence. They should be segregated in some

place where they will be physically comfortable, where they may be made industrious and useful, and where a separation of the sexes will prevent the increase of their worthless kind. My judgment is that the man or woman who through the vagaries of his or her own disposition has once been forced to wear the stripes of disgrace is likely to employ the same tailor during the rest of his or her life. Such persons will become permanent boarders at one or another of the places provided for the seclusion of the worthless. It is well that where they are first sequestrated there they should be permanently kept. Through this course alone society will be spared the periodical havor they will be sure to work during their intervals of freedom.

IMPERSONAL RELATIONS BETWEEN PHYSICIAN AND PATIENT NECESSARY

Certain dangers inevitably arise where an intimacy exists between doctor and patient, since few physicians are morally so constituted that they will order a prosperous patient to do this or that or find another physician. In other words, instances have not been uncommon where the toleration of physicians for unfortunate practices among their patients has had its basis,

and perhaps one not entirely inexcusable in these days of high pressure from professional competition, in self-interest. Social relations also have often led physicians to tolerate practices that they knew to be harmful to their patients and to the community. A patient who is a member of an influential club or a fashionable church is likely to be an asset of exceptional value to the physician whom he patronizes, for he is likely to recommend him to his friends. Good business management on the physician's part leads him to keep such a patient good natured and comfortable, and to keep him comfortable means, among other things, to keep him free from pain. Where the patient suffers from an incurable malady, the use of drugs is not only excusable, but commendable; but instances are all too frequent where the malady is not incurable, but only puzzling and beyond the average practitioner's power of diagnosis, so that he covers up his ignorance by the administration of pain-deadening substances. Patients who invariably and promptly pay their bills are sometimes in a position where they can tell a doctor what to do; whereas it should be the doctor's unalterable resolution to retain the upper hand. Instances of this kind are far less grave

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in connection with the use of alcohol than in connection with the use of drugs; the physician may be said almost never to play any part in the establishment of an alcoholic habit among his patients, while he has surely played a most important part in the spread of drug habits.

CHAPTER XII

CLASSIFICATION OF HABIT-FORMING DRUGS

PIUM is the basis of almost all the habitforming drugs. There is no other drug
known to the pharmacist that has a similar
action or can be used as a substitute when a
definite tolerance of it has been established.
The chemists have given us more than twenty
different salts or alkaloids of opium in various
forms and under as many different trade names,
and I regret to say that they are busy working
in their laboratories to put upon the market injurious drugs under various supposedly harmless disguises, but intended in the end only to
deceive.

MORPHINE

Morphine is the active principle of opium, and until a few years ago only crude opium or morphine was used for medical requirements. Morphine is intrinsically far worse than opium itself, for opium has certain properties which partly counteract the effect of the morphine

that it contains. But morphine is not only the active principle, but the actively evil principle, of the drug.

The user of morphine always retains his faculties. He is usually capable of intelligent conversation. Unlike the alcoholic's brain, his is not inflamed. It is impossible for the physician intelligently to discuss his symptoms with an alcoholic; with a victim of drugs, on the other hand, he can thresh out every detail of the case.

Later coedine was placed upon the market, supposedly an innocent alkaloid of opium, non-habit-forming, but still capable of eliminating pain and suffering due to illness or injury. After taking up this work, my investigations soon led me to realize that it was not the quantity of the drug taken which produced the drug habit, but the regularity of the dosage. I also found from my clinical comparisons that codeine has only one eighth the strength of morphine, yet in the end just as surely a producer of the drug habit similar to that of morphine itself.

HEROIN

At this writing the most harmful form of opiate with which we have to deal is heroin.

This preparation of morphine was first put upon the market by German chemists about fifteen years ago, the word "heroin" being nothing more than a trade name. It was first used in cough mixtures, and was widely discussed in the medical and pharmaceutical press, where it was claimed that all the harm of morphine had virtually been eliminated in this product, which, without having the depressing effect of morphine, at the same time preserved its stimulating effect. A great number of physicians themselves have acquired the habit of taking opiates in this form, believing at the outset that they were not harmful drugs.

My investigations soon showed me that heroin is three times as strong as morphine in its action, and for that reason its use sets up definite tolerance more quickly than any other form of opiate. For the same reason it shows more quickly a deleterious effect upon the human system, the mental, moral and physical deterioration of its takers being more marked than in the case of any other form of opiate.

Until the Federal Pure Food Law was passed we did not know that many of the well-known, advertised medical preparations contained quantities of various salts or alkaloids of opium. The unsuspecting users of patent medicine were making themselves confirmed drugusers unwittingly, and did not realize how necessary the habit had become to them until for one reason or another they had been deprived of their usual daily dosage.

The reader may imagine my surprise when, although a layman, I found that the physician, to whom we had looked for guidance in administering and prescribing these drugs, knew nothing about them beyond their physiological action; that their medical training both in college and in clinics had left them in virtual ignorance of the whole question. The physician freely prescribed or administered these various drugs, while laymen were able to buy over the counters of druggists prescriptions containing definite quantities of them. Unknowingly, the doctor and the druggist were creating great numbers of drug-fiends.

Physicians do not yet know over how long a period such drugs can be administered in regular daily dosage without setting up a tolerance, after which the patient cannot be deprived of the drug. If the public had been better advised on this subject, it would have been able to protect itself, and would have been more careful about what it took.

COCAINE

Outside the opium group, there is at present only one other drug that must be considered as habit-forming, and that is cocaine. The prostitution of this drug from its proper uses is absolutely inexcusable. It was first used medicinally about thirty years ago, and as an anesthetic only. Its administration upon the nose by specialists in that field of surgery soon established the fact that it not only deadened tissue, but set up a certain stimulation which for the time being made one feel abnormally strong or mentally active. This was the beginning of its common use in the shape of socalled catarrh cures. Only a small quantity -from five to ten per cent.-was used. The tissue of the nose is very susceptible to the action of drugs. When it is applied in this way, the circulation takes up the drug as quickly as if taken hypodermically. Unscrupulous chemists and physicians have unloaded upon the world a drug which is beneficial when taken medicinally, but one that has reaped a harvest of irresponsible victims, in which murder, all forms of crime, and mental and moral degeneracy have conspicuously figured, and all for financial gain.

The habit was first generally spread through the medium of catarrh-cures. Cocaine contracts and deadens the tissue with which it comes in contact, and thus, as in the case of catarrh, relieves the patient from discomfort, making him feel, indeed, as if there were no nose on his face. Its effect, however, lasts only from twenty to thirty minutes.

This is one of the reasons why the cocaine habit is so easily formed. A man taking any powerful stimulant is sure to feel a corresponding depression when the effect of that stimulant has died away, and it then becomes necessary for him to take more of the drug in order to buoy himself up and restore himself to the point of normality. It is among cocaine-users, therefore, not a yearning for any abnormally pleasurable sensation which sends them back again and again to their dosage, but merely their desire to be measurably restored to the comfort which is natural to the normal state. It must be apparent, however, that as soon as it has be-

come necessary for any one to resort to the use of a drug in order to rise to the normal there has been a marked depreciation, physical or mental, and probably both. This explains the fact that many criminals are found to be cocaineusers. No drug so quickly brings about a mental and physical deterioration. It is virtually certain to be a short cut to one of two public institutions, the prison or the madhouse. It will send the average person to the prison first because it is an expensive drug, and the craving for it is more than likely to exhaust his financial resources and then drive him to theft. It is the most expensive of all drug habits. I have known victims who habitually used one hundred and twenty grains a day, at a cost of about seventy dollars a week. This undoubtedly explains the great number who have been made criminals by using cocaine. One who uses it thereby diminishes his earning capacity; while, on the other hand, one who must have it must have money, and much of it.

It may be that this matter of cost explains why the under-world has suddenly taken up heroin instead of cocaine. The former is much cheaper.

HYPNOTICS

While I have only touched upon the opium group and cocaine, I wish to put myself on record now as saying that there is no class of drugs so sure in the end to bring about a deterioration of the physical being as the frequent use of the hypnotic group, or coal-tar products, the sleepproducers. I have never seen more pitiable cases than those who have come to me after they had been taking regularly, during a considerable period, some cure for sleeplessness. This habit not only produces an extreme neurotic condition, but changes the entire temperament of a person. It will turn the most beautiful character into an extreme case of moral degeneracy.

Insomnia, headaches, and such ailments spring from a disorganized physical condition. Trying to alleviate them by the use of powerful drugs does not remove the cause, but compounds the physical disabilities which produce these unfortunate physical results. Some day I hope to see as stringent a legal regulation of the sale of these drugs, used for this common purpose, as there now is of opium and its products and cocaine.

SLEEPING-POWDERS, OR HYPNOTICS

The time cannot be far distant when both Federal and State governments will recognize the danger that lies in the unrestricted sale by druggists and the uncurbed administration by physicians of sleeping-powders, or hypnotics. It cannot be denied by any one who is thoroughly familiar with the subject of habit-forming drugs that in such substances may lie a peril comparable to that inherent in cocaine and opium compounds. Hypnotics of many varieties can be obtained at any drug store in the United States without a doctor's certificate. The sale of bromides is absolutely unrestricted. The many and varied coal-tar products, of which veronal is the leader, with trional, suphonal, medinal, as close followers, and the numerous proprietary remedies, such as somnose, neuronidia, bromidia, Peacock's bromides, etc., may be mentioned as preparations which are widely advertised and openly and energetically sold, and all of which are definitely dangerous.

COAL-TAR PRODUCTS

Preparations for headaches and neuralgia are notably dangerous. There can be no doubt of

the necessity for legal restriction of the sale of anti-kamnia, phenalgin, orangeine, Koehler's headache remedy, shac, all coal-tar products notable for their production of anemia and depression, and undoubtedly responsible for the presence of many men and women in the mad-houses of the land. The chemist whose genius is responsible for the introduction of caffeine to overcome the depressing effect of some of the other component parts of these preparations has put hundreds of thousands of dollars into the pockets of the manufacturing druggists and has saddled the world with a great and unnecessary weight of physical and mental degeneration.

THE PERIL OF THE DRUG-STORE

Not least among these preparations that have most importantly contributed to the tragic army of drug-users in the United States have been various diarrhea remedies and other bowel correctives containing a large amount of straight opium. Morphine, opium, and heroin appear in many cough-mixtures in habit-forming quantities and are offered for sale everywhere save in New York State, where recent legislation somewhat restricts the traffic. Indeed, in every

State except New York there are few druggists who do not make up and sell preparations of their own containing codeine, morphine, heroin, or some of the derivatives of opium.

No druggist has a right to prescribe any of these powerful drugs. The American public has fallen into the bad habit of trusting the druggist when it should go to the physician. A dozen times every day in the experience of the average American druggist a customer enters who says, "I want something to make me sleep," or, "I want something to cure my headache." Without hesitation, and without blame, for with him the custom has probably been unconsciously built up, the druggist reaches to his shelf and dispenses preparations in which the utmost peril lurks-preparations containing ingredients which should be sold only on the prescription of a physician. Under the present law, as I think it exists in every State, druggists cannot prescribe, but they can advise customers to purchase advertised preparations and those which they themselves compound.

Only a very powerful drug can stop a headache as quickly and completely as Americans have come to demand. The preparation must be strong enough to deaden disordered nerves, and being chosen because it will be generally effective, not selectively effective, as in the case of a remedy chosen after an intelligent diagnosis has revealed the nature of the trouble to be treated, it is virtually certain to have no curative qualities whatever. Hundreds of deaths have resulted from unwisely experimenting with such preparations. Most of us have peculiar idiosyncrasies with regard to certain drugs. I have seen patients who could not take so much as two grains of veronal or trional without flushing, itching, and similar symptoms. With such people large doses might bring about serious results and even death.

CHAPTER XIII

PSYCHOLOGY OF ADDICTION

HE common idea that one who is struggling with a drug or alcohol habit needs sympathy and psychological encouragement is totally at variance with the facts. No one has ever accomplished anything worth while by holding the hand of an alcoholic, and any one who is endeavoring to help a case of this sort will find himself instantly and seriously handicapped if he puts himself in intimate personal relationship with his patient. Social intercourse in any degree should be tabooed. The physician should never take a meal with any of his patients, or visit a theater with them, or take a drive with them. I have never made a friend of one of my patients, although among them have been many whom I should be glad to number among my friends; and no man would go further to help them than I.

Personally, I have never been an excessive alcoholic. It is an interesting fact that many

men endeavoring to deal with people of this class use as a bait the statement that they themselves have been victims. Their usual claim is that they first cured themselves, and then took up the work of curing others. I remember a meeting of social-service workers in Boston that I was invited to address. I made a statement to this effect in the course of my talk and greatly offended a previous speaker who had emitted the usual professional patter concerning his original self-cure. I was quite willing to compare with him the results of our methods of treatment, but had no opportunity so to do.

HEREDITARY TENDENCIES TOWARD ADDICTION AN IMPOSSIBILITY

It is absolutely essential that the man who wishes to help another who has lost control must first accurately understand not only his mental imperfection, if there is any, but his general psychological state. The line between sobriety and drunkenness in the man who has once lost control is almost indistinguishable; it is impossible when talking with him to be sure whether you are talking with the normal mind or with the alcoholic mind. Having once made certain that it is the normal mind to which you are pre-

senting your arguments, your next necessary step is to strip away every mental reservation. Thousands of men who have honestly desired to leave off alcohol have been prevented from doing so by their own secretiveness; it is this mental reservation which has been responsible for many of the failures of my treatment.

While the absolute inheritance of a craving for alcoholis, in my experience, a rare thing—so rare as to seem almost negligible, there is no doubt, on the other hand, that many men and women inherit imperfect nervous systems. An imperfect nervous system, if it knew the reason for its own imperfections, might naturally crave alcohol; but inasmuch as such an imperfect system is not naturally accompanied by this instinctive knowledge, the theory of hereditary alcoholic craving must be set aside as untenable. I absolutely deny, therefore, the possibility of such hereditary tendencies. I know that by so doing I may cause acute mental discomfort to those who have made of heredity an excuse for their errors not only to their friends, but in their own minds. The old cloak of heredity has been worn to tatters and must be discarded. Who among us cannot follow up the branches of his familytree and find somewhere upon one side or the other a person of alcoholic tendencies? In ninety families out of a hundred any one who looks can find such an excuse for his own weakness. In thousands of instances physicians have taken seriously such excuses offered by their patients, but the doctor who listens to his patient's babble of heredity is sure to be misled, and the patient who believes this too commonly accepted theory robs himself of his strongest weapon against alcohol—his own conviction of his personal responsibility and power for self-help.

ALCOHOLISM AS A DISEASE

We hear much sympathetic talk of the "disease of alcoholism." This is only in a sense true. It is not a case of helpless chance, for the difficulty has been manufactured and developed by man himself. The alcoholic, mentally weakened by the reaction of the stimulant, is of all people most likely to exhibit that most striking evidence of weakness—a craving for sympathy rather than for blame. Habitual alcoholics continually plead for sympathy with mothers, fathers, wives, and friends; and too often they are granted not only pity, but, what is worse, toleration. The sanatorium promoters and proprie-

tors of fake cures continually harp on alcoholism as a disease; and even a few scientists, who should know better, have been misled into an acceptance of this theory. Doctors should be the first to knock from under their patients the psychologically harmful props of the heredity theories.

The first thing a physician must do when dealing with an alcoholic is to cut every string of excuse which lies between him and his habit. He must leave nothing of this sort to which the drinker may cling. Sickness, worry, unhappy circumstances of whatever sort must immediately be eliminated as excuses for alcoholic indulgence. If they are not, the patient, although he may gain for a time the mastery over his habit, will presently be certain to find an excuse in his own mind to justify a return to it. Then will come a new downfall. There must be no reservations either in the attitude of the doctor or his patient or in the mental attitude of the patient toward himself.

MENTAL ATTITUDE A VITAL CONSIDERATION

The possibilities of medical help for the alcoholic have been exhausted when the patient has been freed from the effect of the stimulant and put in a physical condition wherein he feels no inclination toward more alcohol. Great psychological assistance may accompany this definite medical treatment when the patient's physical craving for alcohol has once been eliminated if the physician brings him into a mental state which gives him confidence in his own ability to keep away from stimulants in the future.

I cannot too strongly emphasize the fact that no cure exists, or ever will exist, for alcoholism. Its effects may be eliminated, and the victim's physical condition become so greatly improved that weakness will not make him yearn for stimulation; but this does not constitute a cure. Nothing except a man's own mind, whether the treatment extends over six weeks, six months, or six years, can ever relieve him of the danger of a relapse into alcoholism. In most cases a definite medical treatment is the intelligent beginning of help, but no medical treatment, no matter how successful, can compass that victory which a man must win by means of his own determination.

THE CHRONIC ALCOHOLIC

The physician still regards such cases only from the point of view of physical hazard. It

is my opinion that in alcoholic cases the physical hazard is the matter of least importance, and that the world at large has devoted altogether too much effort to its endeavors to preserve chronic alcoholics, just as it has devoted far too little effort to rescue the victims of drugs. It is my opinion that among alcoholics, no matter how worthy they may have been before they lost control, not more than twenty-five per cent. of those whose addiction has become chronic are curable; that is to say, promise any reward whatever for salvage work. The world must remember that the inflamed brain leads to everything on earth which is not worth while, and therefore that the man whose brain has for any considerable period of time been in this condition must have enormously deteriorated. It must also be remembered that at least one half of the world's chronic alcoholics have syphilitic histories.

The alcoholic is usually susceptible to the advances of any woman whatsoever, and as a rule devotes less than the normal attention to his own wife. To set out to reclaim a chronic alcoholic is, therefore, to set out to reform a man who has been weakened morally and mentally as well as physically. In dealing with such people,

were the matter left entirely to me, drastic measures would be taken. It is my belief that the hopeless inebriate should be unsexed, not because of the danger that, if left sexually normal, he might transmit his alcoholic tendencies by heredity to his offspring, but because he is a liability at best, and to leave him normal adds to his potentiality for waste and evil. Children born of alcoholic-tainted parentage are not specially likely, I think, to yield to alcoholic and tobacco tendencies; but they are apt to lack vitality and mental stamina, so that the probability of their making worthy records is small. If we go one step beyond syphilis and consider other venereal diseases, we shall undoubtedly discover that not twenty-five, but ninety, per cent. of chronic alcoholics, excluding women, have been victims of gonorrhea. I am told that modern science is recognizing this disease, which was once regarded as of slight importance, an inevitable experience of youth, and something to be accepted and regarded lightly, as an ailment of nearly as vicious an influence upon the race as is syphilis. Therefore I have become convinced that the salvage of alcoholic derelicts is of vastly less importance than prevention at the outset. This principle is being more and more generally recognized throughout the world; it stands behind sanitation and all preventive medicine, and it will before long be recognized in connection with the problem of alcohol. Thus the battle against alcohol will become, as the battle against tuberculosis has become, a campaign of education.

It is my belief that every community should have an institution in which hopeless inebriates may be kept away from their cups and away from sexual association. There they should be put at useful occupations; full advantage should be taken of whatever productive capacity alcohol may have left in them; and they should be maintained in a state as happy as their capabilities may permit until they mercifully die. Their segregation would not prevent hereditary drunkenness, for there is, as I have said, no such thing as an hereditary drunkard, but it would prevent the transmission of imperfect nervous systems, and depleted intellect and will power.

SELF-CONFIDENCE NECESSARY

Involved in helping these cases, my investigations have shown me that when once it is determined on reasonable evidence that a man is

curable, the first effort should be devoted to reëstablishing his confidence in himself. He should be "given a new mind" upon the subject of drink and general self-indulgence. It does little good to free a man from alcohol if his mental state is so poor that he will celebrate this boon by again making himself a voluntary victim of the habit. It is for this reason that I have found the least hopeful work in reclamation to be that which is conducted among the idle rich. The alcoholic idle poor are virtually hopeless; the alcoholic idle rich are absolutely hopeless. To the reform of the drunkard mental and physical occupation and some sense of moral responsibility are imperative. It is because of these things that I have deliberately and persistently refused to use the word "cure" in connection with my treatment. A man cannot be cured of alcoholism. He can be given medical aid which will restore his self-control.

The ordinary methods in vogue for the reclamation of alcoholics are pitifully futile. The greatest mistake of all is that workers never finish with those whom they are endeavoring to help. One must finish with the alcoholic promptly and conclusively. I have found that alcoholics taking treatment at my hospital must

understand that I do not wish to hear from them after they have left my care; that I do not wish to know if they have yielded to new madnesses and relapsed into alcoholism. It is specially important for an alcoholic to learn that at a certain point society will have had enough of him. Fathers must break with alcoholic sons and daughters, mothers must break with alcoholic children, wives and husbands must be freed from alcoholic mates, charitable institutions must be rid of alcoholic derelicts. Society itself must be rid of this waste material, after it has ascertained that their cases are hopeless and has provided comfortable sequestration for them.

THE DRUNKARD WHO CAN BE SAVED

Now let us turn to the vast army of people who are worth while, but who, nevertheless, have, through mistakes common to our society, become victims of the alcoholic habit. It would almost seem that the incurables among alcoholics have received more consideration from the kindly minded, and even from the scientifically inclined, than have the curables. The curable among alcoholics are intense and pitiable sufferers. They have never had real help. They have been penalized. The poor among them

have been colonized in harmful state institutions by the public authorities; the rich among them have been placed in equally harmful private institutions by their relatives and friends. The alcoholic who is punished by incarceration in a cell is harmed, not helped, by it; the man who, on the mythical chance of reform is shunted off to a state establishment, or who is sent by prosperous friends to board at some expensive sanatorium, stands to lose, not gain, his experience. These methods merely beg the question. They recognize the drunkard as a liability and put him out of sight; they do nothing toward his real regeneration. The inebriates' farm is based on the same utter misconception as the fashionable sanatorium to which the rich man's son may be committed. An intelligent handling of this subject would close or entirely reform ninety-nine per cent. of the public institutions devoted to the care of inebriates, and would depopulate one half of the sanatoriums between the Atlantic and the Pacific. To put a poor man to sober up on a farm where the State will pay his board and expect him not to become an active menace to society as soon as the period of his sequestration comes to an end is no more foolish than to put the rich

man's son into a private institution where he will be petted, coddled, and retained at the highest rates as long as possible, and from which he will be eventually permitted to return to his old haunts freed from the immediate physical discomforts of his past alcoholism and therefore provided with a fresh capacity for strong drink and rejuvenated powers for evil-doing. Placing a drunken young man in a sanatorium where some one will pay his board while he lives in utter idleness is certain not to correct, but to complete, the evil work which has been started in him; and thus in many cases the very means adopted by friends and parents for the benefit of those they love are likely to increase rather than to decrease their ultimate tendency toward dissipation.

Nothing can be much more pitiful than the spectacle of a youngster led into an alcoholic addiction through the influence of older men. I am by no means accepting the theory of hereditary drunkenness when I say that many young drunkards are only faithfully following their fathers' footsteps, and cannot be justly blamed for their error. Too often it is true that they literally find themselves unable to catch up with their fathers in alcoholic exploits, because their constitutions, depleted by vicious parental habits, prove too weak to stand the pace.

Even where boys are not unfortunately influenced by vicious examples offered by their parents, there are circumstances of our modern life that are likely to work havoc with the rising generation. The youth who up to his twenty-first birthday has been permitted to "have his own way" is not likely to have formed the habit of traveling in a very good way; nor will he be likely to change it for a better one when it is proved to him and to his friends and to society that it is bad; for habits form early. Association with thousands of those who have gone wrong has proved many social facts to me, one of which I mention here despite its apparent irrelevance. The boy who has never known the value of money, on whom the responsibilities of life have never been impressed, is as seriously uneducated as he would be if lack of common schooling had left him illiterate.

CHAPTER XIV

RELATION OF DRUGS AND ALCOHOL TO INSANITY

THE habitual drug-taker and the confirmed alcoholic are puzzles that baffle the alienist. The man with the "wet brain" is a contradiction of all the rules of normality. In many criminal trials men have been adjudged insane who were merely in abnormal states due to the habitual use of drugs or alcohol, of which, without proper treatment, they have been suddenly deprived.

In one of the largest hospitals in the United States I once ran across an old woman crooning while she rocked an imaginary baby. She had been formally and legally adjudged insane by the State's experts. As a matter of fact, she was suffering only from an hallucination due to alcoholic deprivation. I suggested definite medical treatment for this case when I discovered that she was about to be transferred from the alcoholic ward to the insane pavilion. In two days after the administration of this treat-

ment she had lost all her hallucinations, and on the third day was dismissed from the institution. Not long ago I observed a similar case in a foreign hospital.

It is my belief that commitments for insanity in the United States might be decreased by one third if in every case where insanity was suspected, but where an alcoholic or drug history could be traced, the patient should be subjected to the necessary medical treatment before the final commitment was made. The sudden deprivation of drugs and alcohol which follows the imprisonment of alcoholics and drug-users upon disorderly or criminal charges has produced thousands of cases of apparent insanity sufficiently marked for the subjects to be placed in insane asylums. There, as in the prison, no intelligent note is made of their condition, nor is any proper treatment applied, the result being that they become really insane-insane and hopeless. If we had any means of securing accurate knowledge of the number of such incurable maniacs who are now confined in our asylums, we should find in it a startling evidence of the lack of knowledge on the part of the medical world of what deprivation means to the habitual victim of drugs or alcohol.

GENERAL IGNORANCE OF THE RELATION OF ADDICTION TO INSANITY

The necessity for educating the public in regard to the very definite relation between alcoholism and insanity should no longer be overlooked. There lies a public peril of unappreciated magnitude in the fact that mere deprivation, the only method so far followed, has been, and if it is not corrected, will continue to be, one of the principal feeders of our insane asylums. Alcoholism will lead to insanity eventually even without deprivation.

The case is somewhat different with drug victims. Ordinarily they will not become insane unless deprived of their drug, although in the final stages of the habit they are likely to become incompetent and subject to certain hallucinations, imagining the existence of plots against them, suspecting unfairness on every hand, taking easy offense, exhibiting, in fact, a general distorted mental condition. It is true, indeed, that in some instances the drug victim who is deprived of his drug may become definitely insane, but death is the more frequent result.

I have before me a clipping from a newspaper published in Columbus, Ohio. There, after the

enforcement of restrictive legislation, the authorities found it necessary to ask the governor for some special procedure which would authorize them to supply drug victims with their drugs until proper medical treatment was provided. This did not relate to those victims who had come exclusively from the under-world, but referred specially to those habitual drug-users whose habits had been acquired through illness. It can scarcely be expected that restrictive legislation will entirely prevent the sale and use of drugs in the under-world any more than restrictive legislation has been able to prevent the practice of burglary or any other type of crime or lawlessness. It is highly probable that the under-world will always be able to get its drugs; but it is nevertheless true that the passage of restrictive legislation and the enforcement of such laws will tend to prevent the descent of many into the criminal class.

Even this is comparatively unimportant. Those who suffer most are those who have been given the habit by physicians. These are honest drug-users, and to them at this writing no helping hand is anywhere held out save in New York State. I have been somewhat disgusted—I am sure that is the word I wish to use—by the

continual outpouring of sympathy and constant manifestations of anxiety on the part of good people in regard to the under-world, when these same good people regard with indifference or classify as criminal the involuntary victim toward whom the most intense and understanding sympathy should be extended.

MENTAL ATTITUDE OF THE DRUG-TAKER AND THE ALCOHOLIC

The victim of drugs psychologically differs very materially from the victim of drink. Until his trouble has reached an acute stage, the alcoholic feels little interest in any of the methods advertised as remedial for alcoholism. Many men deny to their friends and even to themselves that they are alcoholics until they have reached a point akin to hopelessness in their friends' eyes and their own. The drug-user, on the other hand, knows that he is a victim as soon as he becomes one; in ninety-nine cases out of a hundred he is immediately filled with an intense longing to be relieved of his habit. Thousands of alcoholics will defend their vice. A library might be filled with books, fictional and other, glorifying alcohol and the good-fellowship and conviviality that it is supposed to promote.

One might search a long time for a victim of any drug habit who would speak with affection of the material which has enthralled him. No poet has ever written any song glorifying morphine. There is no drug-user in the world who would not hail with joy any opportunity that might lead to his relief. The drug-victim investigates every hint of hope with eager interest, reading, intelligently questioning, experimenting. He shrinks from publicity with a horror that is backed by an acute consciousness of his condition, while the victim of alcohol becomes so mentally distorted or deadened that he takes no thought of consequences, cares nothing for publicity, and finds himself unable to avoid public exhibitions of a kind that put him into the hands of the police. Public hospitals do not tempt the drug-user for, having investigated them, he knows that they are not competent to give him real relief.

EXPEDIENTS OF DRUG-TAKERS

Nothing but really enforced restrictive legislation, fashioned after the model of the present New York State law, will bring to light the drugvictims in any community. The New York law uncovered thousands of them, and within two

weeks forced Bellevue and other hospitals to devote many beds to sufferers from drug-deprivation. Similar restrictive legislation would uncover every sufferer from drugs in the country and thus accomplish more good than could achieved by any other similarly simple means. No man on earth is more pitiably affected than the drug-taker; no suffering is more intense than his when deprived of his drug. The fact that rather than undergo such suffering men and women will resort to the most desperate expedients has been proved a thousand times. When confronted by the terrible prospect of deprivation, they invented plans worthy of the mental agility of the most famous fictionist. Drugs were smuggled into prison hidden in the heels of visitors' shoes. One wife who knew the agony her husband must endure if deprived of his regular morphine dosage took to him clean linen which was admitted to the prison without question, but which, as an accident revealed, had been "starched" with morphine. Another ingenious wife or sweetheart devised the expedient of sending in to a prisoner oranges from which the juice had been cleverly extracted and which had been filled hypodermically with a morphine solution.

If there is no length to which a drug victim will not go rather than find himself deprived of his drug, there is no length to which he will not go in order to obtain relief from a habit the existence of which fills him with horror. This has often been illustrated in the course of my practice, but perhaps never more strikingly than when I learned of the experiences of a certain judge in Jacksonville, Florida. This far-sighted, merciful, and progressive jurist had come in contact with one or more pitiable cases of the drug habit to which he wished to give relief. He communicated with me, and I was very glad to coöperate in aiding with definite medical relief several drug-victims taken before him. This procedure was commented upon in the public press, and presently the judge found himself importuned for help by those who had committed no crime, but expressed themselves as quite willing to be sent to prison as the only way in which they could get the treatment that was being administered under his auspices.

DRUG-TAKING MORE OFTEN THE CAUSE THAN THE RESULT OF CRIMINALITY

A careful study of the histories of drug-takers who upon one charge or another find themselves caught in the meshes of the law will reveal that in most cases, or at least in many cases, the drug habit has led to crime rather than the reverse. If an efficient treatment for the drug habit were established in a prison almost anywhere in the United States where such a treatment did not elsewhere exist, it would result, I am sure, in the actual commission of crimes by a certain number of people willing to endure the misery and disgrace of incarceration for the mere sake of securing treatment for their affliction. Any drug-user will tell you that no punishment recorded in the course of human history, no torture visualized by the most inventive imagination, can compare with the unspeakable agony of deprivation.

FALLACY OF IMPRISONING DRUG-TAKERS

That imprisonment should rarely, if ever, result in freeing a person from the drug habit can mean only one thing: that drugs are obtainable in every prison. Guards and other employees in such institutions are of a low class, for men and women of a high type are unlikely to seek such employment. I fear that this fact will prove one of the most serious stumbling-blocks in the path of those who are endeavoring to

make a success of inebriety-farm experiments. In the first place, they will not be able to find men of a high type anxious to serve in the subordinate positions provided at such places; and in the second place, even if such men can be found, they will be unlikely to obtain positions because persons of an inferior type will be certain to be pushed forward by political influence. Such places would be used as means wherewith to pay political debts, and this would be more or less complacently tolerated, because society has always underrated and still underrates the terrific complications of the task of working for the reclamation of, or even caring for, the downand-out. Such work is not employment for the saloon-keeper, the ward heeler, or the ex-prizefighter, and of such is the personnel of most prison staffs made up. The reclamation of the alcoholic wreck means far more than physical rehabilitation. It means moral and psychological regeneration, and such work can be done only by people of understanding and delicate sensibility. The alcoholic from the city who has been perhaps an office employee or a professional man and who is sent to an inebriate farm will find there nothing curative save deprivation. Even if outdoor work will harden his muscles, it must be admitted that the surroundings in which this is accomplished may well ossify his brain.

PSYCHOLOGY OF THE DRUG HABIT

Nothing could more clearly indicate the popular ignorance concerning the drug habit than the general belief that it is usually accompanied by moral deterioration. Where the habit is an accompaniment of life in the under-world, moral deterioration of course exists, though this is due rather to the under-world than to the drug habit. In the thousands of histories where the habit has been acquired by the administration of drugs by physicians it results in moral deterioration no more than drinking tea does. As a matter of fact, that portion of society which holds a drug victim blamable is woefully mistaken and inhumanely unmerciful, the truth being that the man or woman who is not taking drugs is lucky.

THE NECESSITY OF DEFINITE MEDICAL TREATMENT IN DEALING WITH ANY FORM OF ADDICTION

It is impossible for me to conclude this book without discussing further the question of treatment for those afflicted with habits or addictions.

My taking up this work in 1901 was due almost entirely to an investigation into the methods employed to restore those who had lost control through the use of habit-forming drugs, whether they had acquired, the habit through dissipation or from the administration of the drug by a physician on account of illness or injury. At that time such cases were supposed to be hopelessly incurable, and the victims only drifted from bad to worse until they had been accounted for either in a mad-house or in the morgue.

I found, on making inquiries from some of the leading medical men who had been dealing with the various types of mental and nervous diseases, that they were virtually unable to name any case of a confirmed drug-user who had been permanently benefited by institutional or any other means of treatment. This was very difficult to understand, particularly in the case of drug-users who had acquired the habit through the administration of the drug by a physician, and who earnestly desired to be freed from the habit. It seemed incredible that a skilled physician could not eliminate the craving or desire for the drug, or restore these unfortunates to

the point where their systems would not demand or feel the need of it.

I soon found out why this was so. My investigation showed me that the drug habit is a mental as well as a physical condition; that the physiological action of an opiate is to tie up the functions, resulting in a deterioration of the vital organs when the victim has taken the drug sufficiently long to set up a definite tolerance.

The medical world had apparently been unable or had not attempted to bring about a definite physiological change, and to place such patients where they would not crave drugs and where their systems would not demand them. To my further surprise, I found that the medical world had been depending entirely on deprivation as a means of treating such cases. They would immediately send patients to an institution where they were put under surveillance and guarded by attendants, or they would attempt by gradual reduction of the dosage to eliminate the habit.

CURE BY DEPRIVATION IMPOSSIBLE

This investigation led me into some very interesting discoveries. I found that old, con-

254 firmed subjects of the drug habit were sent to such institutions. Where they were taking large daily doses of opiates the institutions were able to reduce these people, when there was no underlying physical disability, within a few weeks or a few months, according to the temperament of the patient, to a very small daily dosage, often as low as one half or one eighth of a grain a day. When they had reached this dosage it was often found absolutely impossible to limit them further. In some cases where the patient was confined and finally deprived of the drug entirely I found that when he had reached this minimum dosage he would suffer just as much physical discomfort in the end as if he had been suddenly deprived of a very much larger quantity of the drug taken daily. This led up to the further interesting fact that even where patients were finally deprived of the drug and lived through the horrible suffering inevitably accompanying the deprivation, although they outlived the tremendous depression and lassitude which followed, and for long periods of weeks and months after that time had the best of care and attention until they showed marked

improvement in their physical condition, never-

theless, with too few exceptions, they never lost the desire for the drug. Always the need of some stimulant returned, and on the slightest excuse or opportunity they were taking their drug again. My investigation finally proved to me that deprivation did not remove the cause of the drug habit, because it did not remove the physical craving for the drug. No matter how long a period the deprivation had been, the needed physical and mental change had never taken place.

EFFICACY OF THE AUTHOR'S TREATMENT

During the first two years of my work, after finding in various ways patients from the underworld to use as subjects for demonstration, I was finally able to treat any case of drug habit which came to me unless it was complicated by underlying physical disability. After a period of from three to four days these patients would not feel the slightest craving or desire for any form of opiate, whether their addiction had been cocaine, alcoholic stimulants, or tobacco.

When the efficacy of this treatment was assured, it began to attract the attention of some of the best-known medical men in the country—

men who were interested in this line of study. They followed carefully the medical administration of the new treatment of these cases.

It was only a matter of time before the value of the work was thoroughly established and became a medical fact. After hundreds of definite clinical histories had been recorded, the formula was publicly announced, first, at the International Opium Conference at Shanghai in 1909, and a month later to the medical world. Since the complete information concerning my work has been given to the medical profession, and after all these years of study and investigation and medical comment, I have never yet had from any physician an entirely satisfactory explanation as to why or how we were able successfully to unpoison these cases in this short period. At present this treatment is, so far as I know, the only one known to medical science that will bring about this definite physiological change.

The intelligent beginning of help in these cases is to unpoison the patient, put him physically on his feet, where he does not want drugs or drink, and where he does not feel the slightest desire or craving for them, and has no dread of ever drifting into these habits again. When you have brought about this definite physical

change, you are invariably able to get a definite mental change. You cannot hope to get the mental change until you have first cleared the system of poison, for in this state the patient is in a most responsive condition to deal with. If physical building up, change of environment, change of surroundings in any way whatever are necessary, they can then be taken up intelligently.

LEGISLATIVE EFFORTS

The knowledge I gained from dealing medically with those afflicted with habits and addictions led me to take up personally the movement to bring about definite legislation with a view to subordinating as much as possible the traffic and consumption of drugs to legitimate medical needs; and to put an end to the criminal negligence by which such drugs have been permitted to be imported, manufactured, and distributed.

In contact with the afflicted of this class, I discovered the laxity with which drugs were dealt in, and began in 1912 to try and bring about some restrictive legislation with regard to the evil before the New York legislature. I had first found that in the medical use of the drug the principal evil had sprung from the knowl-

edge of what would ease pain, and that the principal means used for this purpose was the hypodermic syringe. At that time there was no restriction placed upon the sale of this instrument; it could be bought in any drug store just as easily as a package of chewing-gum. The department stores that carried drug supplies advertised hypodermic outfits as low as twenty-five cents. A physician's instrument permitted to be manufactured and sold in this way! Through the bill which was introduced in the New York legislature in 1912, for the first time in the history of the medical world it became possible to purchase this instrument only on a physician's prescription.

In 1913 I was the author of a drastic law regulating the sale of habit-forming drugs in New York State, but because of severe pressure brought by physicians and druggists, I was unable to put it through. In 1914 I tried again, and after a hard fight I was able to have enacted a bill, which was introduced by Senator John J. Boylan, and which bears his name. For the first time there was put upon the statute-books of a State real restrictive drug legislation. Other States are taking up this matter, and, as the intention was, the New York bill has been

the means of establishing a legislative precedent.

I regret very much that the aim and purpose of Federal legislation has been largely defeated by the powerful drug interests, but I predict that it is only a matter of time before public sentiment will defeat this powerful drug lobby, as it has always defeated other lobbies of a similar kind, and that the country will be largely freed from the illegal habit-forming drug traffic.

Until there is some international understanding between the countries that produce these drugs and the countries that consume them, we shall have to submit to more or less smuggling of these drugs into our country. Smuggled goods rarely, if ever, find their way into channels for legitimate medical needs, and for that reason it is only the under-world that would be affected by their use and abuse.

It is only a matter of time before the commissioners of health for the various States will be given authority enabling them to issue rules and regulations governing the health of the people that will wipe out the quacks and charlatan venders of all common advertised fake medicine cures.

THE NEED FOR REGULATING THE ADMINISTRATION
OF DRUGS

I have been told that to require a consultation of physicians before the administration of a habit-forming drug would put upon the patient a financial burden which he should not be asked to bear. No fallacy could be more complete. There is in the United States to-day not one victim of the drug habit who, knowing as he does the intense suffering it entails, would not rather have given up ten years of his life and been forced to put a mortgage on his soul than to have had this habit fastened on him. Money? Money is nothing! The cost of a consultation is a small price to pay for the possible difference between life-long thralldom and free manhood or womanhood. And let me add in regard to the physician who objects to the legal establishment of a danger-point in drug administration that the physician who feels big enough to accept personally the responsibility of creating a drug habit is too small to be intrusted with that power.

PERCENTAGE OF THOSE TO WHOM THE PERMANENT ADMINISTRATION OF DRUGS IS A NECESSITY

The percentage of sick people to whom the administration of habit-forming drugs is a necessity for the preservation of life or comfort is smaller than is generally supposed even by the medical profession. When I was drafting my restrictive bill to be introduced into the New York legislature, I was asked by my lawyer to enumerate those physical troubles which demanded the constant use of habit-forming drugs. I found this to be impossible. I have known many instances in which to deprive of drugs patients suffering incurable illness would have been little less than criminal. This alone enabled them to live in comparative comfort.

I have known of many cases of drug habit which have grown out of the administration of morphine for recurring troubles, such as renal colic. Such a disorder as this, however, should never give rise to a drug habit, because those suffering from it are subject to such brief periods of pain that a physician could administer the necessary drug without their knowledge. I have had many cases of women who, acquiring the habit through the administration of drugs

at the time of their monthly periods, became habitual users, although each recurrence of the pain lasted only three or four days. When this problem is thoroughly understood, such cases will be impossible, for legislation will not only prevent the layman from securing habit-forming drugs, but will prevent the doctor from the indiscriminate administration of them.

Of course the general reader may think this book merely a clever advertisement. In it I state that it is wrong to stop the use of morphine and alcohol unless the victims can be treated for the habit, and next I condemn doctors and sanatoriums for their useless methods of treatment, while lauding my own. Naturally, my reader may assume that my only motive is the selfish one of money.

Well, one may suppose what he likes, but the truth is that I urge every city and State to establish places that will drive me out of business. I urge physicians to take up this treatment and cure their own colleagues. I have no secrets. My methods have been published, and I am now devoting most of my time to legislative work from which I do not profit a cent.





THE RELATION OF ALCOHOL TO DISEASE

BY

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In the simple heading of the subject-matter of this article there are contained such possibilities of facts and fancies, truths and errors, and wide differences of opinion, that it seems wise to define not only its meaning, but some of the words themselves. What is disease? To many people it is a definite, concrete thing which seizes one in its clutches, holds one captive or possesses one for a second time, and then if overcome releases its grip and one is free and in good health again. But disease is not an entity, even though some agents, as bacteria, are living organisms. It is the lack of some processes which these agents overcome, and others which they set in motion, as manifested by disturbances of

various functions of different organs in the body that make up some of our diseases. Our bodies are often in a state of delicate equilibrium, and if some one gland fails to secrete, or secretes too abundantly, the resulting condition may become a disease. As health is a harmonious relationship between the various functions of different parts of the body, so disease is a disturbance of this harmony. The question of the relation of alcohol to disease becomes a question as to whether or not this narcotic if taken into the body can react on the various tissues and organs of the body to such a degree as to disturb the equilibrium of health. And, furthermore, can this disturbance of healthy equilibrium be permanent and the body acquire a lasting diseased condition?

HOW IT AFFECTS DIFFERENT MEN

Alcohol is classed here as a narcotic and not a stimulant, because we shall see later that alcohol is rather a paralyzer of functions, even when it seems to stimulate, than a producer of increased output from any organ. The time honored idea that alcohol is a stimulant and that, if used in moderation, it is a tonic, is so ingrained in the average mind that it is with the greatest

difficulty that men can be made to realize that even in what seems moderate doses it may injure them. This is especially true as one sees men who all their lives have indulged moderately in alcoholic beverages from which seemingly no harm has resulted. The truth, perhaps, is best summed up by the old adage that what is one man's meat is another man's poison, and there is no question that the effects of alcohol in small or moderate doses is vastly different from its effects in large doses, or in long continued, excessive use. Different human beings react differently to similar amounts of alcohol, and conversely, identical amounts of alcohol will affect different individuals in different ways, even when it poisons all of them. For instance, if alcohol sets different processes in motion which bring about damage to the individual, we find that in some persons it has injured the heart and arteries, in others it has affected the liver or stomach, leaving the brain and nervous tissues free from damage, while in still others the body in general seems to be untouched and the brain and nervous tissues suffer the injuries. It is not uncommon to see a man who has partaken freely of alcoholic beverages all his life with neither he nor his friends conscious that his

intellect has suffered or deteriorated thereby, to find suddenly that his circulatory and digestive systems are seriously and permanently damaged. On the other hand, many a drunkard has become a burden to his family and the community, with his personality deteriorated, his intellect rendered useless, while his circulation and digestion remain unimpaired, and he lives long years a nuisance and a burden to his environment.

Since I have made the distinction between moderation and excess in the use of alcohol, it will be well to define what is regarded as excess, and what moderation, in order that the effects of both may be considered. Physiologic excess, it seems to me, has been best defined by a brilliant Frenchman named Duclaux, who says that any one has drunken alcohol to excess who one hour after he has taken it is conscious in any way of having done so. If after a drink of any alcoholic beverage has been taken, wine, whiskey, or whatever it may be, an hour later we feel ourselves flushed, tongue loosened, or if we are heavy and drowsy, or, if we find our natural reserve slightly in abeyance, if the judgment is not as sternly accurate as before partaking of the beverage, if the imagination is unusually active

and close consecutive reasoning not as easy as before, if we think we do our work much better, but next morning realize we haven't accomplished quite as much or done it as well as we expected, then we have shown a physiologic excessive intake of alcohol, and an amount which if continued will produce damage somewhere in the body. Moderation in the use of alcohol means that it be taken in amounts of which one remains unconscious. This may seem a narrow and hard line to draw, and may seem to confine the amount of alcohol that may be consumed to much less than many people wish to indulge in. How much in actual amount this should be with any given individual depends upon that individual alone, and no one can be a law to any other individual than himself. If a man be engaged in severe manual labor or muscular exercise, he can consume more alcohol without detriment than when leading a sedentary life. although the character of the work that he will do may not be as good as if no alcohol were taken.

THE MODERATE USE OF ALCOHOL

The above definition, however, must suffice. We must fix some standard between moderation

and excess, and the more accurately we define moderation, the more narrowly do we confine it. Judge by the above standard, alcohol taken in moderate doses does not seem more than to stimulate the digestive processes of the stomach, increase the flow of blood through the heart, increase the circulation in the periphery and skin, dilate the capillaries, and make it easier for the circulation to complete its cycles. When absorbed into the body in such doses, it can act as a food, and, in fact, as much as is burnt up by the body does act as a food, although it differs from other foods in that it is never stored up. It can replace in energy-giving properties sugars or fats, and being burnt up by the body can give out the equivalent of sugar and fat in muscular energy, and heat generated and given out by the body. Its effect is similar to that obtained by sugar and fats which are taken up by the body when needed and in the amounts requisite to the body at the moment, and it seems to be treated as far as can be seen as other foods for fuel. But it is not an economical fuel because the human organism does not perform its work as well as when there is no alcohol in the ration. Simultaneously when being consumed as food it is exerting its drug action. In this

process it is the more easily available, and thus the sugar and fats are stored up while the alcohol is burnt up; it spares the fat consumption, often causing an increase of bodily weight through the putting on of fat. To those who are accustomed to its use, it seems also to spare the protein consumption of the body, but to those unaccustomed to its use it has the opposite effect, increasing the destructive breaking down of proteins.

DANGER SIGNALS UNHEEDED

Moderate indulgence in alcoholic beverages adds to the pleasures of existence with a great many men, and while it seems to increase their pleasures and broaden the extent of their mental experiences, it cannot be said to increase their powers of accurate mental activity, though it temporarily increases the imaginative flow of ideas. It relieves the feeling of both body and mental fatigue for the time being, an effect which may be an advantage or may be a distinct disadvantage, for fatigue is Nature's warning when to stop, and if we dull ourselves to this feeling and leave the warning unheeded, we may easily go on to harmful excesses of overwork and overexertion. It is doubtful if the moderate drink-

ing of alcohol, as we have defined moderation, sets in motion processes which may so disturb the equilibrium of the body as to cause disease.

Broadly speaking, the excessive use of alcohol injures the body in two ways. It injures the functional cells of the different organs for alcohol is distinctly a cellular poison, and it further disturbs the nutrition of the organs by its injurious action on the blood vessels which supply nutrition to the various parts of the body. Whether to replace the destroyed cells or as a result of the congestion there is also an increase in the connective tissue framework of the various organs. The action of alcohol on the circulation is one of the earliest effects which is shown after it is taken into the body. The flushing of the skin is a beginning paralysis of the minute capillary blood vessels. If habitually indulged in, the effect is a continuous dilatation of the vessels, although it seems for a while in the early stages that there is a toning up of the circulation. Yet excessive indulgence brings with it always a lowering of the blood pressure and finally the chronic congestions in the internal viscera. The action of the heart at first is to make it beat fuller and stronger, but if continued, the effect is also one of paralysis of its

muscle and a diminution of the output of work done, and finally it is a paralyzer of the heart's action. In some persons, through its injury to the cardiac blood vessels and intrinsic muscle of the heart, it sets in motion those morbid processes which result in angina pectoris.

Beginning with the stomach, we find that when alcohol is taken in excess it not only disturbs the processes of digestion that are then going on, if it is taken in greater amount than five per cent. of the stomach content, but it also acts directly on the mucous membrane, producing an irritant action. We have formed here a chronic congestion of the mucous membrane which produces swollen cells, and the digestive glands of the stomach produce an excess of mucus which interferes with digestion, and the resulting congestion interferes with the gastric secretions. It ends in producing a swollen, inflamed mucous membrane, often with hemorrhages. These processes may go on to an atrophic form of gastritis, in which the mucous membrane may be so atrophied that it is unable to secret sufficient gastric juice. The acid of the gastric juice, combining with certain substances in the intestine, is one of the stimulants which causes the production of the pancreatic secretion.

pancreas not alone digests the meats and other proteids, but it changes starch into sugar, and also has a fat splitting ferment. Thus we see that pancreatic digestion is a most important function, and does much more in the digestive work than the stomach. When therefore the acids of the gastric juice are lacking, there is an insufficient stimulus to the pancreas to pour out its complex juices and complete digestion.

THE ATTACK UPON THE LIVER

Alcohol is so rapidly absorbed from the stomach and the upper intestine, that it does not as a rule produce much change in the small intestines. The absorption of the digested food from the intestinal tract by alcoholics when recovering from a debauch is greater than normal, provided they have ceased from their alcohol. The absorbing powers of the intestine remain a long time, and is the reason that so many alcoholics appear so well nourished. The acids of the gastric juice also stimulate the excretion of bile from the liver, and combining with the same ferment, the secretion, being taken up by the blood, stimulates the liver to an increased secretion of bile. If therefore one has so injured the stomach with the taking of alcohol that the mucous

membrane is unable to secrete a proper gastric juice, it is readily seen that the proper stimulation to the liver and the pancreas are lacking, and the equilibrium of the entire digestive process of the body is upset. The blood from all the intestines goes directly to the liver, the circulation of this organ being so arranged that the blood must filter through and bathe the liver cells before it is gathered into a central vein and returns into the general circulation. In fact the liver is the great chemical laboratory of the body, and the complex processes that go on there are as yet but little understood. The processes which I have described as generally characteristic of alcohol are seen to a very marked extent in the liver. There is a chronic congestion, and there is very frequently various forms of degeneration in the hepatic cells, and in many cases an increase in the connective tissue to such an extent as to cause the disease known as cirrhosis of the liver.

Alcohol may also under certain circumstances produce such excessive fatty degeneration in the liver, as in itself to be a menace to existence, for if the liver ceases to do its proper work, the whole minute nutritive chemistry, the metabolism of the body, breaks to pieces. The liver

stands an enormous amount of use and abuse, and it is one of the last organs to give way under great strain, but when its functional processes do break down, the existence of the individual is not much further prolonged. The liver can consume and break down a certain amount of alcohol, but when more is poured into it than it can assimilate, some of it must go through into the general circulation and over the body, flowing to the brain and poisoning this organ, and the other nervous tissues.

The action of alcohol on the nervous tissues constitutes, in the eyes of the majority, the main injury that alcohol does to a human being. Certain it is that the action of alcohol on the brain does more to distort and pervert a man's relationship with his environment than any other action which alcohol has on the body. is through the poison of this organ that the personality of the individual is so changed and so poisoned that a degeneration of the individual in character and morals is brought about. It is here, too, that the widest differences of tolerance and intolerance to alcohol are shown. men may consume enormous quantities and their mental balance apparently remain intact. Other individuals cannot take a single glass of wine without being distinctly affected by it, or rendered unmistakably drunken. The gross injuries found in the brain of those dying from the effects of alcohol are partly due to the effect of alcohol on the circulation and the injury to the blood vessels, thus diminishing the nutrition of the brain and injuring the brain tissue itself, and besides, as we have seen in other viscera, to the increase in connective tissue.

It is not necessary here to go into the details of the minute formation of the cells, how each cell is formed of a cell body and many branches, as one may conceive, growing like a tree or bush with the many branches stretching out and touching other branches of related and adjacent cells. When these dendrites or branches are in contact, there is an interrelationship between the processes of the two cells. Alcohol causes a retraction of the tiny branches one from another and the cells are dissociated, so that the mental processes become dissociated from each other, and the cells themselves degenerate and are unable to carry on their functions; thus we see the functions of memory and of the reproduction of images by memory prevented, the inability of the mind to reason, through the inability of the mind to call up former experiences, feelings and ideas, and a weakening of the power of each cell to take in impressions.

Every person who drinks alcohol to excess will not show every form of mental deterioration that may be produced by excessive indulgence, and the degree of deterioration in intelligence which goes to make up the sum total of mentality. varies greatly in different individuals. All who drink alcohol to excess, however, show some diminution in their judgment. Judgment means the power of recalling various memories of perceptions through the senses, which have come in from the outside world, memories of ideas, memories of emotions, and all the complicated association of ideas that these bring up, and in the recalling of them weigh each one with the other and judge of the value between them. This also means reasoning and decision for action. This power of reasoning and judging is weakened in the alcoholic, and in any brain long poisoned by alcohol it is an impossibility to exercise it. Memory itself is also weakened. There is excessive forgetfulness of the recent past, and in some cases of advanced alcoholism there is absolute forgetfulness of wide gaps of years; a man may be unable to remember anything from the last five minutes back for twenty years, and then

remember back to childhood. The memories of childhood are more easily stamped on the brain than are those of adult life, both because it takes less to impress a child, and because there is not the complexity of ideas crowding into the brain, nor the complexity of association of ideas to be recorded. Therefore memories of childhood make a deeper impress and last longer, and so the complex memories of the adult are the first to be forgotten in the alcoholic, and those of childhood remain.

EFFECT UPON MEMORY AND JUDGMENT

Besides the absolute forgetfulness, there is another form of forgetfulness in the alcoholic which often produces a ludicrous result. This is a perversion of memory. The person may be in a perfectly strange place and meet strangers, and yet be convinced that he has seen the place and met the strangers before, and greet them as old friends. This feeling of having been there before occurs in normal, healthy people, and may be simply the expression of momentary fatigue, or proceed from some unknown cause; but it is grossly exaggerated in the alcoholic, and cannot as easily be straightened out as in the normal mind.

The imaginative faculties of the mind are at first heightened by alcohol, and this often produces bright, witty remarks in those who have taken enough alcohol to have their imaginations stimulated and their judgment slightly inhibited, so that their ideas crowd readily to their minds and their tongues are loosened. Often, however, they say things which though bright and witty had better be left unsaid, and this is an indication of the beginning paralysis of their judgment. The imaginative faculties, however, are not constructively increased by alcohol, and it does not conduce to reproduction and creative ability, which requires memory and constructive thought. In this connection Kraeplin's experiments have shown that alcohol makes easy the liberation of movements from the cortical areas of the brain, that is, the transformation of ideas and memories of movements into deeds, but no real mental power is given; for while a man may feel that he is doing things better with than without alcohol, as a matter of fact he is not doing them so well. This sense of self-approbation is very characteristic of the alcoholic. His judgment is gone, not only in regard to his mental processes, but very essentially regarding himself, and it may be truly said that while alcohol

shrinks the judgment, it swells the self-conceit. This abnormally good opinion of his diminished abilities renders the alcoholic exceedingly complacent; he is persuaded that at any time he can give up drinking if he chooses, and he is unable to appreciate the rapid deterioration of his intellect. One cannot separate the will of an individual from his personality, and the weak-willed individuals, while they may possess many other agreeable characteristics, are lacking in the progressive force which strong characters possess. Alcohol weakens the will, causes the personality itself to deteriorate, and there is a lack of initiative; there is the ever ready specious explanation why nothing is ever done; there is a boastful conceited estimation of what can be done. With the judgment perverted the alcoholic cannot act at the proper time in the right way, no matter how much he may be willing to admit the necessity for correct action, and on the other hand he is equally powerless to prevent wrong action on his part, especially when such action has anything to do with a further indulgence in his alcohol.

The emotional side of the personality shows the same deterioration from the higher to the lower, as do the other intellectual processes. It

is the same story that the last to come are the first to go, and the first to come are the last to go. All emotions of refinement, those of the esthetic development, disappear the earliest. The sense of affection and moral responsibility, duty to family and friends deteriorate and vanish. There is nothing left but the consideration of what affects the self, and an alcoholic is the most studied, selfish soul that exists. The remaining emotions of anger, fear and nutritional reaction for food and drink remain to the last, as these are the most primitive of the emotions. With the weak will preventing action, and with the loss of memory and inability for continuity of thought, we find the emotion of fear predominating to a very noticeable extent. This is true whether the alcoholic be delirious or not, for in all forms of alcoholic delirium, fear is a very predominant symptom. In some forms of delirium tremens, the intensity of the fear is a fair criterion of the degree of the poisoning. The various senses of sight, hearing and taste are dulled, because the cells producing the mental perceptions are equally poisoned with the rest of the mind.

WEAKENING THE MORAL FIBER

With the inaccuracy of sense perception and loss of memory and diminished judgment, one cannot be surprised to find that alcoholics are notoriously inaccurate, unreliable and untruthful. They cannot tell the truth even with assistance. But often what is credited to them as untruthfulness is mere inability to perceive things accurately, to remember accurately, and therefore to state things accurately. With the deterioration of the personality, that is, of the will, one would naturally expect that the deterioration of morals would go hand in hand. One cannot remain moral or virtuous without sufficient will to do so, and without sufficient will to make a struggle for self-control, and this is so in the case of a mind poisoned by alcohol. I do not claim that lack of morals is a disease, but moral development has appeared late in the development of the race, and such racial development is expressed by the individual. With the deteriorated mentality of the alcoholic, we must expect that the characteristics of late development will be the first to go, and for this reason we must realize that alcoholism naturally tends to immorality and crime. As a matter of fact,

it is claimed that fifty per cent. of the crimes in France and forty-one per cent. in Germany are due to alcoholism, and no doubt in England and America the percentage is equally high. As might be expected, the offenses are principally those of disregard of the rights of others, contempt of law and order, assault, disturbances of domestic peace and robbery, and to all these crimes the habitual drunkard is particularly prone.

But it is not my purpose to discuss the effect of alcohol in any way except as it pertains to the human body, nor to go into the reasons why men so poison their bodies as to bring about these deleterious results. The deterioration that we have been considering, when occurring in the mind, would naturally cause one to infer that insanity must also be common in those who are addicted to alcohol, and such is indeed the case. In New York State alone I believe it can be safely said that fully ten per cent. of the women and thirty per cent, of the men confined in the state asylums are there through forms of insanity caused by alcohol. It will not profit us to go into the various forms of alcoholic insanity, but when we realize that one-third of the men in the insane asylums to-day in New York are there because of excessive indulgence in alcohol, and also that the State spends annually over six million dollars to care for them, we realize both the terrible ravages that alcoholic poison has made on the mentality of men and the enormous cost that it entails upon the community.

As to the alcohol circulating in the blood, there is an endeavor naturally to get rid of it as with all poisons, and the kidneys in this endeavor show the same processes that are elsewhere seen, of destruction of the specific cells, congestion, and increased connective tissue growth. Whether it is that these cells are destroyed in an endeavor to eliminate various substances for which they are not fitted and break down under the strain, or whether they are directly poisoned by the alcohol itself, the resultant factors are those best understood in the lay mind as acute and chronic Bright's disease. Whether or not alcohol produces these various processes in the kidneys which result in these diseased conditions, there is no question but that certain of these diseased conditions appear more frequently in alcoholics than in others. the destructive processes about which we have been speaking in the various viscera, there are

certain results of alcohol that may be said to affect the general condition of the individual. By this I mean the general resistance to bacterial infection, the resistance to injury to the body, and the ability to repair such injuries. Alcohol diminishes the power of the body to resist bacterial infection. The alcoholic is more prone to acquire bacterial diseases, and when these are acquired he is infinitely less able to resist them. In Bellevue Hospital in 1904 there were 1,001 patients with lobar pneumonia. Of these, 667 gave a history of alcoholism; 334 were non-alcoholics, which means that there were twice as many alcoholics suffering from this disease as non-alcoholics. Among the alcoholics the mortality was fifty per cent., and among the non-alcoholics, 23.9 per cent. Here again the mortality among the alcoholics was more than double that which prevailed among those who had not taken this narcotic. The same is true of other infectious diseases. When injuries occur to the body, such as broken legs or arms, there is a very wide difference in the picture produced in those who have drunk to excess, and those who have been sober. The shock produced in these instances is greater in the weakened nervous system of the alcoholic, and among those who have habitually taken alcohol there is a very great tendency after broken bones to develop delirium tremens, and when this occurs in these patients, the outlook is always very grave. A broken leg or arm does not bring with it any such danger to those who have led sober lives. The process of recovery from disease and accident, owing to the deteriorated nervous system and the poisoned circulatory system, is much slower in alcoholics than in others.

WEAK WILLS INHERITED

Unfortunately, the injury which alcohol does, and the processes of deterioration which it sets on foot, do not end with the individual. Alcohol poisons and injures the germ cells of both sexes, and the offspring of those addicted to its use may inherit a weakened and injured nervous system. The taste for alcohol, the craving, so called, is not inherited. This idea that, because a man has an alcoholic father or mother, he inherits the taste for alcohol, is a superstition that has been used by the weak as an excuse both for overindulgence in alcohol, and as a further excuse why no attempt should be made to check their indulgence. What is inherited is a weak, unstable intellect and personality, prone

to excesses in all things, one that is weak-willed and weak in resistance to temptation, and one more easily affected by alcohol than the ordinary normal individual. There is also often inherited a lack of moral perception and moral sense, causing the individual to do things which make one doubt his sanity; yet he can not be called insane, but really wanders in the border line between mad and bad, which is often worse than insanity itself. Alcoholic inheritance does not stop at instability of the nervous system or weakness of the personality, and one is rather staggered to realize the high percentage of imbecile, epileptic and weak-minded children that may be born to alcoholic parents. A detailed study of the imbecile school-children throughout all Switzerland showed that fifty per cent. of them were born in the days nine months after the periods of greatest alcoholic indulgence, such as the New Year, the Carnival, and the grape harvest, and that the births of the other half of the imbeciles were evenly scattered through the remaining thirty-eight weeks of the year. It has been shown that in France, Germany, Poland and Switzerland, from twentyeight to seventy per cent. of the epileptics in some of the institutions were the descendants of

alcoholics. Demme, in comparing the results of the health and death rates between ten alcoholic families and ten non-alcoholic families, found that in the alcoholic families out of fiftyseven children, twenty-five were still-born or died in the first month of life; twenty-two were designated as sick, and ten as healthy — while in the non-alcoholic families, five were still-born or died early, six were sick, and fifty were healthy. Thus only 17.5 per cent, in the alcoholic families were healthy, while eighty-two per cent. in the non-alcoholic families were healthy, and only eighteen per cent. not healthy. The percentages, therefore, were almost exactly reversed. These statistics mean that not alone may the chronic alcoholic bequeath his poisoned nervous system to posterity, but from the statistics in Switzerland of the imbecile children, we must realize that even a temporary debauch may leave a curse upon the innocent child; they also mean that alcohol produces those processes in the individual which tend to the degeneration of the race, and tend after a few generations to extinction, and thus does Nature benefit the race by turning a curse into a blessing through the extinction of the degenerate.









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